# VirginiaTech

magazine

Civil War dispatch

Million-dollar relay | Risky business

winter 2010-11 | vol. 33, no. 2

Wirginia Tech



The president of a large university regularly juggles myriad projects, issues, constituency and faculty concerns, funding problems, legislative requests, student and donor meetings, and an array of similar activities. During these hectic days, I am driven by and comforted by a core outcome of higher education—the personal and economic opportunities afforded to our students.

Thus, I am pleased that the recently released report from the Virginia Governor's Commission on Higher Education Reform, Innovation, and Investment features three major thrusts: economic opportunity, affordable access, and reform-based investments. Most importantly, the governor has called for an additional 100,000 college degrees in Virginia over the next 15 years. This concept, first proposed by the Virginia Business Higher Education Council's Grow By Degrees program, seeks to improve economic development and quality of life across Virginia.

The commission's major recommendations, which dovetail with Virginia Tech's traditional strengths, call for investing in high-demand STEM (Science, Technology, Engineering, and Math) degrees, funding academic research, and linking state economic development goals to higher education incentives. Virginia Tech's land-grant heritage is predicated on just such goals. Our institutional DNA and track record are well suited to help the commonwealth expand job growth and strengthen companies and communities.

During the early part of this decade, Virginia Tech worked with sister universities to develop direct state investments in academic research. The resulting \$22 million investment in Virginia Tech helped us expand R&D expenditures more quickly than all but four universities in the nation during the past five years. Academic research is about more than dollars, however; it is about solving problems or generating new ideas and technologies to spur economic development. By any measure, our past performance is impressive on both counts.

The governor's commission also underscores the sound concepts of Virginia's higher education "restructuring" in 2006—state legislation delegating enumerated powers and limited autonomy to selected Virginia universities. Virginia Tech is one of four schools with such authority, a designation that has enabled our institution to make progress even as state support has plunged.

"Reform-based investments" include institutional incentive funding for increasing STEM degrees, graduation rates, or facility utilization. The commission also proposes "portable," direct student funding, in which each Virginia student is guaranteed a certain amount of state funding added to the state's share of the cost of education. Other incremental state funding will be provided for addressing selected state priorities, such as STEM education or economic development goals.

The third leg of the commission's plan, ensuring affordable access to higher education, is essential in creating those gateways of economic and personal opportunity and therefore is given high priority. We strongly believe that the state must increase financial aid, even when it is reducing appropriations for its colleges and universities. At Virginia Tech, we know that tuition has risen as state support has dropped, which is why we have committed to increasing university-supported financial aid by at least \$1 million per year. We've increased university aid from about \$1 million in 2000 to more than \$12 million this year. Grants, scholarships, and waivers have grown from \$119 million to \$159 million in just the last three years. Overall, financial aid at Virginia Tech now exceeds \$359 million.

This plan suggests a major reworking of the funding model and policies affecting Virginia higher education. Gov. Bob McDonnell informed the commission that a "new compact between the state and our leaders in higher education" will refocus efforts to boost economic development. Del. Kirk Cox, vice chairman of the commission, said, "It's clear that the model won't be fully funded initially, but incrementally as the economy recovers." After the release of preliminary recommendations, commission member Sen. William Wampler suggested that McDonnell make higher education funding a top priority; otherwise, the system would be "a high-performing vehicle that doesn't have any fuel."

We have been arguing exactly that position for many years.

#### **Contents**

Winter 2010-11 | VOL. 33, NO. 2

### 8 How Tech Ticks: The atypical backpack

With a hands-on, minds-on approach to the learning experience, Virginia Tech teachers stock their classrooms with more just slide rules and No. 2 pencils. Legos, fungi, and even daggers provide students with a memorable educational experience.

### **10** Patricia Amateis: Good chemistry

Recipient of the 2010 William E. Wine Achievement Award, Associate Professor Patricia Amateis brings chemistry to life in the classroom, peppering large, introductory science classes with her inimitable teaching style.

### 12 The Civil War: 150 years later

As the sesquicentennial of the Civil War approaches, Virginia Tech professors and Civil War experts weigh in on the war's relevance to and influence on 21st-century America.

### 18 James I. Robertson Jr.: "Mr. Civil War"

During an illustrious career spanning more than 40 years, James I. "Bud" Robertson Jr. has written more than 20 books, created numerous educational resources, and engrossed thousands of Virginia Tech students.

### 22 | Million-dollar relay: Tech cultivates world's top collegiate cancer fundraiser

Raising more than \$1 million in 2009 and 2010 combined, students have pushed the Virginia Tech Relay For Life to the very top. The annual event is just one example of how service is the lifeblood of the Tech community.

### 26 Risky business: Hokie entrepreneurs thrive in trying times

Despite rough economic waters, Hokie alumni who sense opportunity where others see only bleak economic forecasts are harnessing the unique spirit of the entrepreneur.

### 30 | Talent shows: Honors courses pair top-notch students and teachers

Honors colloquia bring exemplary students and committed faculty and administrators into the classroom for courses that develop creative solutions to real-world problems, whether the solution helps a village in Honduras or a science museum in Roanoke, Va.

### 40 Cultural kaleidoscope: Alumna serves as ambassador to two island nations

Mary Jo Wills (M.B.A. '94), the U.S. ambassador to the republics of Mauritius and Seychelles, makes it her mission to foster cross-cultural understanding and nurture dialogue.

### 43 Alumni Association News

page 43: Commentary

page 44: Drillfield Series

page 45: Alumni career resources program

page 46: Alumni chapter program highlights

page 47: New columbarium completed on campus

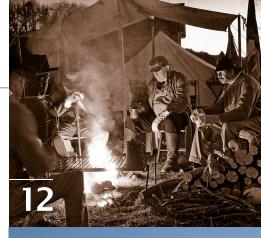
page 47: Board of directors ballot and 2010-11 board officers

page 48: Hokie Gold Legacy Program

page 48: Class of 2011 centennial ring gift unveiled

page 50: Alumni travel

**On the cover:** Allen Gross, a re-enactor with the 24th Va. and 83rd Pa. Civil War Living History Organization, outside the Major Graham Mansion in southwestern Virginia's Wythe County in November. Graham was a lieutenant in the Civil War. Photo by Jim Stroup.





Letters to the Editor . . . . . . . . 2

 Virginia Tech Magazine Winter 2010-11, Vol. 33, No. 2

Jesse Tuel Assistant Editor **Denise Young** Art Director Glen Duncan Graphic Designers Tiffany Pruden Nathan Skreslet '03 '04 David Stanley '95 Tim Wilson Graduate Assistant Chad O'Kane M.A. '11 Hillary May '12 Tim White '13 Contributors Catherine Doss Philipp Kotlaba '12 Col. Dave Miller '10 Albert Raboteau Alumni Association Communications Director **Dave Hunt** Juliet Crichton Richard Lovegrove **Juliet Crichton** Photographers Michael Kiernar Kelsey Kradel John McCormick Jim Stroup **Business Manage** Paula Vaught Advertising Coordinator Horace Cross '08, M.S. '10 **Shirley Fleet** Associate Vice President for University Relations Larry Hincker '72, M.B.A. '94 Director of Marketing and Publication Vice President for Alumni Relations Tom Tillar '69

Address changes and circulation inquiries should be mailed to the Virginia Tech Alumni Association, Holtzman Alumni Center (0102), Blacksburg, VA 24061, or sent via e-mail to alumni data@vt.edu. Alumni notes should be mailed to Alumni Notes, Virginia Tech Alumni Association, Holtzman Alumni Center (0102), Blacksburg, VA 24061, or sent via e-mail to fleets@vt.edu. Virginia Tech Magazine is produced by the Office of University Relations, with support from Alumni Relations. The Virginia Tech Foundation underwrites meet preductions extended.

Advertising opportunities are throughout the magazine, and alumni may promote their businesses in the Class Notes section. For advertising rates and information, contact Horace Cross, advertising coordinator, at hbcross@vt.edu or 540/231-2966.

Virginia Tech does not discriminate against employees, students, or applicants for admission or employment on the basis of race, gender, disability, age, veteran status, national origin, religion, sexual orientation, or political affiliation. Anyone having questions concerning discrimination should contact the Office for Equity and Access.

### The Bauhaus heritage of Tech

I read with some dismay

the letter entitled "The Center

for the Arts" (fall 2010 Virgin-

ia Tech Magazine). Certainly

all individuals are entitled

to express opinions about the design of this important university building. However, the brief history and characterization of the Bauhaus is historically incorrect and misleading. The phrase "form follows function" is a paraphrase from the American architect Louis Sullivan's famous essay, "The Tall Office Building Artistically Considered," first published in 1896. The phrase is actually "form ever follows function" and is part of a more-nuanced thought about architecture. The assertion that the Bauhaus led to "plain, box-like structures" is a gross oversimplification of the complex educational program and influence of the Bauhaus upon later generations of architects. It should not come as a surprise that the highly ranked programs in the School of Architecture + Design at Virginia Tech are in fact influenced by many educational tenets of the Bauhaus still valid today. In fact, the founding dean of what was then called the College of Architecture at Virginia Tech, Charles Burchard, was Walter Gropius' student at Harvard University. The early founding documents and manifestos of the Bauhaus state that its purpose was to "... unite and

productively stimulate the arts." The intellectual basis of the school, according to Gropius, was to acquaint students with the foundations of creativity rather than perpetuate any dogmas or "isms." Finally, it is sadly unfortunate that the writer makes an association between the Nazis' closing of the Bauhaus due to its decadence with the design of Virginia Tech's Center for the Arts. Employing the tragically flawed blood-andsoil aesthetic policies of the Nazis to critique the design is unproductive. Surely we can hope for an open dialogue (about the design of a university building) that is more historically informed and patently less offensive.

There is one point in the letter that I certainly can agree with—the worth of a building for the arts at Virginia Tech.

Frank Weiner Professor, School of Architecture + Design, Virginia Tech

## MMI interviews for veterinary students

It is noteworthy that the Class of 2014, now in its first year of study at the Virginia-Maryland Regional College of Veterinary Medicine (VMRCVM) on the Virginia Tech campus in Blacksburg, was also chosen utilizing the multiple-mini interview (MMI) methodology. [Editor's note: See "Diagnosing the doctors of tomorrow," fall 2010

Virginia Tech Magazine.]

The process differed very little from that used by the Virginia Tech Carilion School of Medicine (VTC). In fact, Jacque Pelzer, VMRCVM director of admissions and student services, and Jennifer Hodgson, VMRCVM associate dean for professional programs, met with VTC in early 2009 to consider using MMI and were included in VTC's training session.

VTC had rolling admis-

sions, so the interviews took place at different times. VMRCVM prescreened a total of 875 applicants, and the 275 applicants selected were interviewed on campus in two-and-a-half days in January 2010. I believe this process helped ensure security, confidentiality, and consistency and thus fairness for all. The interviews did necessitate a huge one-time effort of planning and execution and a larger number of interviewers. Half of the interviewers were comprised of faculty, staff, and administrators. The other half of the interviewers were veterinarians in private practice from Virginia and Maryland. I felt this distribution was a real plus, for it allowed us practitioners an opportunity to evaluate qualities we value and desire in future colleagues in our profession.

Jack Rosenfeld, a co-creator of the MMI at McMaster University, was on site and assisted throughout the process,

including training interviewers. I would hope that this VMRCVM accomplishment deserves an equal amount of pride and recognition as VTC has received. We are the first and only veterinary school with this distinction.

David E. Moreman, D.V.M., M.S. Front Royal, Va.

### Recognizing osteopathic medicine

This letter is in response to an article entitled "Diagnosing the doctors of tomorrow," published in the fall 2010 edition of Virginia Tech Magazine.

I am currently a third-year internal medicine resident finishing up my training in an American Osteopathic Association-approved residency program with Montgomery Regional Hospital in Blacksburg, Va., and the Veteran Affairs Medical Center in Salem, Va., I have had the privilege of rotating and working with residents from the Carilion Roanoke Memorial Hospital on numerous occasions over the past three years and have very much enjoyed the ability to learn from and with my allopathic counterparts (M.D.s).

With this said, I am a doctor of osteopathy (D.O.) by education and training and am wondering why the medical school that I attended was overlooked in the research process that took place prior to making the following statement in the article: "On the

heels of a 20-year span during which no new medical schools were established in the United States, Tech has exercised its innovative awareness to craft a school that utilizes radically different but proven methods of selecting and teaching students."

Considering the fact that I

completed my medical school education at the Edward Via College of Osteopathic Medicine (VCOM) in the Corporate Research Center (CRC) on the campus of Virginia Tech and my post-graduate training in the Commonwealth of Virginia, I definitely have many blessings to be thankful for when considering the private educational system in this lovely state. I think that it is important to point out the error of the abovementioned quotation.

VCOM was established in 2001 and accepted its first class of approximately 150 students for the 2003-04 matriculation year. VCOM is one of four osteopathic medical schools (D.O.s and M.D.s are considered equivalent in the eyes of the American Medical Association as well as the U.S. government), in addition to at least one allopathic medical school (Florida Atlantic University School of Medicine), to be established in the last nine years, a far cry from the nearly two decades quoted.

Since its inception, VCOM has grown by leaps and bounds, extending its physical presence into South Carolina with an additional campus (currently accepting applications); graduating three (almost four) classes of fully accredited physicians in that time period; placing the vast majority of its graduates into primary care fields of medicine (family medicine, internal medicine, general surgery, OB/GYN, and pediatrics); and serving the residents of the Appalachian region.

region.

Why would such an organization be overlooked?

Why would a medical school located 35 minutes from Roanoke, situated in the CRC, and established in 2001 not be considered prior to noting the "20-year span during which no new medical schools were established in the United States"?

Jarod Bailey, D.O. Christiansburg, Va. Clarification: The story cited the Association of American Medical Colleges, which tracks the accreditation of allopathic medical schools and recorded no new allopathic schools from 1982 to 2002. The association does not monitor the accreditation of osteopathic schools; thus, the story's statement should have been qualified with the word "allopathic."

Editor's note: The Edward Via College of Osteopathic Medicine (VCOM) is an independent, private college residing in the Virginia Tech Corporate Research Center. Virginia Tech is a public entity of which VCOM is not a part. Tech and VCOM do maintain an affiliation agreement that offers VCOM students access to many Tech facilities and student services although VCOM graduates are not considered Tech alumni.

Letters to the editor may be sent to vtmag@vt.edu or to 105 Media Building, Blacksburg, VA 24061. Letters may be edited for clarity and length.

# Use of Hokie Stone formalized by board of visitors

At its Nov. 8, 2010, meeting, the board of visitors passed a resolution to make Hokie Stone the official building material and the collegiate gothic style official for all academic core and life sciences precincts on the Blacksburg campus. The board's resolution noted, "This attractive and distinctive stone more recently assumed the moniker 'Hokie Stone,' reflecting its status as a Virginia Tech architectural tradition," adding that the "physical campus is one of the most tangible features that everyone who is touched by Virginia Tech remembers."

Virginia Tech Magazine Winter 2010-11 3



### \$3.4 million grant awarded for oil spill study

Researchers from the College of Natural Resources and Environment received a \$3.4 million grant from the U.S. Department of the Interior to study the effects of the Deepwater Horizon oil spill in the Gulf of Mexico on piping plovers, shorebirds that have been listed as threatened since 1986. Anticipating the spill's implications for the plover population, the team

began work on the grant application within days of the explosion that caused the oil spill. When completed, the research will provide data litigators can use to base settlements for damage lawsuits.

### Plagiarism sleuths tackle full-text biomedical articles

Researchers at the

Virginia Bioinformatics Institute and collaborators have shown that a computerbased text-searching tool is capable of unearthing potential plagiarism from among thousands of full-text papers in biomedical literature. Using a computer program called eTBLAST, researchers examined 72 full-text articles to find that the introduction and methods sections of papers tend to be the most similar. Now ethicists will be able to analyze the findings to develop publishing guide-

### Five students selected as ACC Undergraduate Research Scholars

Five undergraduate students have been selected as 2010-11 Atlantic Coast Conference (ACC) Undergraduate Research Scholars. The scholars receive a \$2,000 award for research expenses such as supplies, travel, and the use of specialized research services. Charles Baker, Ritesh K C, Bryan Murray, Ryan Prest, and Sarah Webster were selected based on their ambitious research projects.

### College launches Leadership Institute

The College of Natural Resources and Environment launched a new program to develop leadership abilities in top students and help prepare them for a future in managing natural resources for sustainability and biodiversity. The Leadership Institute is a two-semester, special-study sequence in which students with demonstrated leadership skills and academic ability will strengthen their talents through in-class discussion and hands-on leadership projects. The students will also travel to Richmond, Va., and Washington, D.C., to meet with leaders and policymakers in the field of

### Farrier participates in World Equestrian Games

natural resources.

Travis Burns, farrier at the Virginia-Maryland Regional College of Veterinary Medicine, served as an official farrier at the 2010 World Equestrian Games in Lexington, Ky. Held every four years, the games are comprised of eight equestrian sports. Burns was chosen to participate after being selected by the American Farriers Association. The selection process included a rigorous application to ensure that the farriers were qualified for and capable of maintaining the hooves of the world-class horses participating in the international event.



### **Engineering Expo** draws 240 companies to campus

Hosted by the Student

Engineers' Council, the annual Engineering Expo in September drew more than 240 companies and government agencies to campus to meet students seeking jobs, internships, or face-time with representatives. The same week, The Wall Street Journal released a survey ranking Virginia Tech 13th in the nation among colleges favored by recruiting employers and fifth in the nation by engineering recruiters.

### Researchers contribute to turkeygenome sequencing

An international consortium of researchers has completed sequencing and assembling 90 percent of the domesticated turkey genome, thanks in part to the efforts of Virginia Tech faculty members. The majority of data is derived from the 10 largest chromosomes (macrochromosomes); researchers are still searching for the best route to sequence the remaining microchromosomes. The genome sequence will provide new data to help scientists identify specific genes that influence meat yield and quality, health and disease resistance, fertility and reproduction, and, ultimately, higher-quality turkeys for producers and

### Scholarship initiative supports 97 students

consumers.

The number of lowincome Virginia residents able to attend Virginia Tech at no cost under the university's Presidential Scholarship Initiative has grown to 97 in the program's second year. The recipients are top performers, boasting an average high school GPA of 3.97 and an average SAT score of 1205. A 2.75 GPA is required of students in the program. All but two students who received scholarships under the initiative in 2009-10 were still in the program at the start of the fall 2010 term.

### Students start university's first student-veterans organization

Two students have started Veterans@VT to address the challenges of entering college following military service. U.S. Army veteran Gino Vivalda and U.S. Navy veteran Zack Mayo launched the organization to provide a social, academic, and career network for students who share a common bond as veterans. Because of the post-Sept. 11 GI Bill, colleges are seeing increasing numbers of veterans and are focusing on veterans' needs.

### McNair wins grant to enrich graduate student portfolios

Lisa McNair, assistant professor in the College of Engineering, was awarded a \$403,000 National Science Foundation Faculty Early Career Development grant to help engineering graduate students develop as reflective practitioners by using e-portfolios to enrich their careers. Posted online, e-portfolios include a mixture of scholarly teaching, research papers, video, and links to research-related blogs, podcasts, and PowerPoint presentations to paint a highly personal narrative of a person's professional experiences.



### **Professor** discovers new tuberculosis pathogen

Kathleen Alexander,

associate professor of wildlife in the College of Natural Resources and Environment. discovered a novel tuberculosis species in the *Mycobacterium* tuberculosis complex, pathogens that have adapted by using mammals as hosts. Alexander discovered that banded mongooses—a species common in central and eastern Africa—living closely with humans in northern Botswana were dying from a mysterious, tuberculosis-like disease. Currently, Alexander and student researchers are intensively studying the behavior and ecology of the mongoose population and this new pathogen across both urban and protectedarea environments in Botswana.

### Pamplin receives Dominion Foundation gift

The Pamplin College of Business has received a \$40,000 gift from the Dominion Foundation to help students with their career searches. The gift will be used to create a web application to match students with their ideal employer and employers with their ideal recruits. The college was among 16 higher education institutions in the state to receive gifts from the Dominion Foundation for projects that focus on workforce knowledge and skills and energy conservation.



(From left) Pamplin Dean Richard E. Sorensen, Pamplin undergraduate career services director Stuart Mease, and Dominion philanthropy manager Cindy Balderson

www.vtmagazine.vt.edu Virginia Tech Magazine Winter 2010-11 | 5 Around the Drillfield



# Veterinary students study food systems, agricultural production in Italy

Jacque Pelzer of the Virginia-Maryland Regional College of Veterinary Medicine led a group of students to Italy for a 16-day course. The purpose of the summer 2010 trip was to expose students to sustainable agriculture methods used in Italy and to evaluate differences between the American and Italian approaches to veterinary education and agricultural systems. Additionally, the students explored Renaissance art and the remains of the Roman Empire while learning about economic and political systems in modern Italy.

# Corps commandant announces retirement

In July, Maj. Gen. Jerrold P. Allen, U.S. Air Force (retired), will retire as commandant for the Virginia Tech Corps of Cadets. During Allen's 12 years as commandant, and the corps has experienced significant enrollment growth. Allen also played a key role the corps' leadership program while fostering an environment focused on academic success, resulting in a corps GPA of 3.03 for spring 2010. He also emphasized outreach, leading the corps to perform more than 9,700 hours of service in 2009-10.

### Poultry Science Association honors two faculty members

Paul Ruszler, Extension poultry specialist emeritus, and Rami Dalloul, assistant professor, both of the Department of Animal and Poultry Sciences in the College of Agriculture and Life Sciences, were honored by the Poultry Science Association (PSA) during its annual meeting. Ruszler was elected a PSA Fellow, the association's highest honor, recognizing members for professional distinction and contributions to the field. Dalloul received the PSA Early Achievement Award for Research. The award recognizes PSA members in the early stages of their poultry research careers.

# Army grant seeks to develop more scientists and engineers

By way of a \$17.2 million U.S. Army grant, Virginia Tech and its partners will determine programs that best train teachers and prepare children in fifth grade and up. Competitions, internships, mentoring, and science fairs are among the high-profile Army-sponsored activities. The Army Educational Outreach Program piques student interest early, encouraging

more college students to choose science, technology, engineering, and mathematics disciplines. Virginia Tech will guide the program through three important milestones: marketing, data collection, and measurement.

### Virginia Tech rises in research rankings

With nearly \$400 million in research expenditures in fiscal year 2009, Virginia Tech is now ranked 44th in the annual National Science Foundation report documenting research expenditures at 697 academic institutions. Virginia Tech ranked 46th in 2008. The

university reported \$396.7 million in expenditures for the year ending June 30, 2009, an increase of more than \$23 million over 2008. The latest figures mark a five-year period of tremendous growth at Tech: In 2004, the university reported \$268.8 million in research expenditures.



### with the new Hokie Mobile app

Virginia Tech released its first application for use on the iPhone and iPod Touch. The free app, called Hokie Mobile, provides users with campus news, events, maps, and a directory search. Setting Hokie Mobile apart from other university applications is the ability for students, alumni, staff, and faculty to use their Virginia Tech PID to log in and access personalized information, such as

their current courses or university account balances.

# Human brain research begins at new institute

Leading brain researcher

P. Read Montague joined the Virginia Tech Carilion Research Institute as a senior professor and will lead programs in neuroimaging and the new field of computational psychiatry. Montague is organizing and heading the Roanoke Brain Study, a cradle-to-grave effort to understand the neural basis of human decision-making and its impact on health. Brain scanners around the world will be linked to the institute's informational hub in Roanoke. Montague will develop human neuroimaging studies of decision-making and social cognition throughout the lifespan under normal conditions and in a wide variety of neuropsychiatric disorders in children and adults. Significant research equipment, including two magnetic resonance imaging machines, has been moved into the facility for the brain study and other research programs.

### Virginia Cooperative Extension announces plan to restructure

Alan Grant, dean of the College of Agriculture and Life Sciences, announced a plan to restructure Virginia Cooperative Extension to better meet the needs of its clientele and to address a cumulative budget reduction of \$10.3 million since 2007 for Extension and the Virginia Agricultural Experiment Station. The restructuring plan provides an infrastructure that will enable Extension to fulfill its land-grant mission and preserve delivery of critical programs related to agriculture and natural resources, youth development, and families and communities

"This plan allows Virginia Cooperative Extension to reduce costs, maintain a local presence across the commonwealth, and continue to provide high-quality, science-based educational programming for Virginia. This will allow us to shift resources to the highest-priority needs of the state and localities." Grant said.

The design and delivery of educational programs will be determined by issue-based program teams. Area program leaders will train, supervise, and mentor the Extension educators (formerly known as Extension agents). The plan also consolidates Extension's administrative field staff into a regional structure.



For these stories and more, check out VT News at www.vtnews.vt.edu. For a regular dose of news, sign up for the Virginia Tech Daily E-mail at the site. Study shows cats defy gravity when drinking water Students design drone for unmanned missions Tech police lieutenant graduates from FBI academy Tech study helps increase aid in Wounded Warrior Program

Tech's Arlington research center to open in summer 2011 Computer scientist wins award for software to combat hacking

Tech awarded \$3.8 million grant to stimulate eastern U.S. wine industry

Virginia Tech Magazine Winter 2010-11 7

# The atypical backpack

Check out some of the most unusual classroom supplies—far beyond pencils and paper—at Virginia Tech.

■ WHAT: Dagger

WHERE: Stage Combat class; Department of Theatre and Cinema

Through the use of stage weaponry such as daggers, actors learn to engage their characters emotionally amid dynamic movements that demand full-body coordination and amid the challenging vernacular of Shakespeare, said Cara Rawlings, assistant professor of movement and acting. The weapons are made by Neil Massey (theatre arts '88), the owner of Rogue Steel in Illinois, who is considered by Rawlings to be one of the best makers of stage weaponry in the world.



**Nintendo Entertainment System and** Atari 2600 video-game consoles

WHERE: The Virginia Tech Gaming and Media Effects Research Laboratory (VT G.A.M.E.R. Lab): Department of Communication

An array of video-game systems, from vintage to brand-new, enables studies by faculty and students that investigate players' physiological and psychological responses to video games, as well as studies that involve recording and analyzing game content, said Assistant Professor James D. Ivory. Responses are measured with electrodes and more traditional methods, such as pencil-and-paper questionnaires.



WHERE: **Engineering Exploration class; College of Engineering** 

**■ ■** WHAT:

Each fall, first-year engineering majors enroll in this required course. Students conduct 14 hands-on activities over the course of 14 weeks, each exposing students to various engineering disciplines. In one lab, students exercise visual communication skills by building objects with Legos. Once constructed, the creations are the subject of schematic drawings, which must be accurate enough for other students to rebuild the structure from scratch, said Vinod Lohani, professor of engineering education.

Snorkel, goggles, mussels

WHERE: Freshwater Mollusk Conservation Center; **Department of Fisheries and Wildlife Science** 

To find mussels in rivers, streams, and pools, students and researchers wear diving gear to get up close and personal, said Dan Hua, laboratory manager at the center. Participants monitor mussel populations and collect gravid mussels for propagation, with a goal of augmenting endangered populations. Fifteen endangered species of mussels are raised at the center, which also conducts outreach programs for the public and for students.

■ WHAT: Turkey Tail (Trametes versicolor, left), Witch's Butter (Tremella mesenterica, lower right), Ice Man's Fungus (Fomes fomentarius, upper right)

WHERE: Mysterious Mushrooms, Malicious Molds course; Department of Plant Pathology, Physiology, and Weed Science

Assistant Professor David G. Schmale III begins each lecture with a "Fungus of the Day" and then takes students on an online adventure. Viewing the Red Sea in Google Earth, for example, illustrates how spores of fungal pathogens are transported over long distances by air. Hands-on learning includes growing edible mushroom varieties at home. At the course's completion, students are better prepared for employment in agriculture, human health, and food safety.

To see Schmale's students' mushrooms-andmolds projects, search Facebook for "PPWS 2004" or go to www.vtmagazine.vt.edu.



■ WHAT: Horse teeth

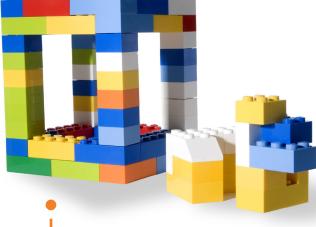
WHERE: Anatomy classes; Virginia-Maryland

**Regional College of Veterinary Medicine** 

Two dozen upper and lower sets of preserved teeth from horses young and old allow first-year students to practice estimating the age of a horse, said Associate Professor Larry Freeman. Students gauge the wear

on the teeth and the degree of eruption (how far a tooth has pushed out of the gum tissue). as both are reliable measures of age.

Go to www.vtmagazine.vt.edu to see video of canine MRIs taken at the college.



Legos

- WHAT: Toy car

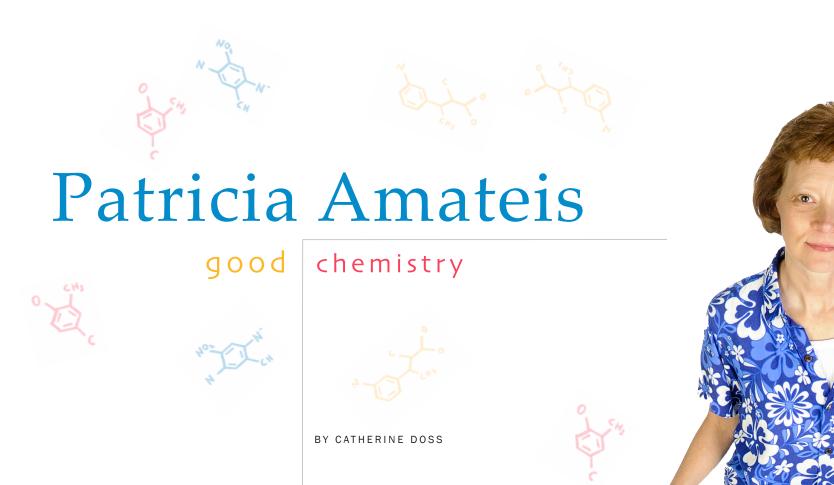
WHERE: House Planning class; Department of Apparel, **Housing, and Resource Management** 

Housing Professor Kathleen Parrott sprinkles her lectures with the unexpected. When she wants her students to visualize a home's outdoor space—such as the room a driver needs to park, turn around, or access the garage—she'll interrupt the series of overhead slides with a toy car "We can't design the

complete with the "vroom" noises. Parrott explained, space until we can understand how the user will be behaving in the space."

www.vtmagazine.vt.edu

Virginia Tech Magazine Winter 2010-11 | 9



₹here was one drop-out in Patricia Amateis' General Chemistry class on Nov. 1, 2010—a pumpkin. Run down after a hard night of trick-or-treating, the

its top and dripping foam from its smile, alongside an articulate and professional faculty member at the front of the classroom.

The pumpkin's demise is just one example of Amateis' engaging, one of the first to fill during registration each semester and keep nonmajors engaged in topics such as valence shell electron pair repulsion theory.

Amateis (Ph.D. chemistry '84), a 26-year teaching veteran, was recognized last year with a William E. Wine Achievement Award for excellence in teaching, one of the highest teaching honors bestowed by the university. She was cited for developing the department's general chemistry curriculum and her long record of consistently superior course evaluations from students.

"Graduating seniors invariably mention her as one of the best teachers they encountered."

"Working with students is the best part of teaching," Amateis said. "My favorite thing is when they appreciate chemistry even when they aren't particularly good at it."

> More than 2,000 students enroll in the general chemistry program each semester. As well as teaching general chemistry, Amateis coordinates graduate teaching assistants for the large General Chemistry class that numbers several hundred students. Along with Associate Professor Emeritus Jim Viers, she developed a unique recitation program that enables upperclassmen to oversee smaller groups of students once a week to help keep chemistry from being what she calls a "spectator sport."

> > -continued on page 35

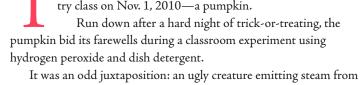


**Patricia Amateis** 

- · Associate professor and director of general chemistry in the College of
- Coordinates more than 100 freshman chemistry labs
- Oversees more than 30 graduate teaching assistants as lab instructors
- Overall student-evaluation scores: 3.86 out of a possible 4.0
- Bachelor's degree in education from Concord College; Ph.D. in chemistry from Virginia Tech

### Recognition

- William E. Wine Achievement Award, 2010
- Sporn Award for Excellence in **Undergraduate Teaching, 1994**
- Alumni Teaching Award, 2002
- Member of Virginia Tech Academy of Teaching Excellence
- Office of Residence Life Student **Programs Division Favorite Faculty** Award, 2006, 2007, and 2009
- Student Alumni Associates Students' Choice Award, 2004 and 2005
- Wrote comprehensive laboratory manual published by Hayden-McNeil
- Routinely speaks and gives chemistry demonstrations to schools and civic



no-nonsense style and quiet sense of humor, traits that make her class

# The Civil Mar: 150 years later

BY RICHARD LOVEGROVE PHOTOS BY JIM STROUP

One hundred and fifty years ago, a nation roiled by war weighed heavily on soldiers like these re-enactors from the 24th Va. and 83rd Pa. Civil War Living History Organization. Here, they warmed themselves outside the Major Graham Mansion in southwestern Virginia.

Historians and people with an interest in Civil War history commonly agree: The Civil War is the most significant event in the history of the United States. From the structure of American government to race relations to the way mail is delivered, the events that unfolded both during and following the war in large part molded the country—and the unique American identity—into what it is today.

The state of the s

As the sesquicentennial of the beginning of the war approaches, the conflict's relevance hasn't diminished. Even now, the events of the 1860s maintain a strong grip on the nation's collective fascination.

"The Civil War lives every day in the American soul and in the fabric of our lives," said Dennis Frye, chief historian at Harpers Ferry National Historical Park, a site that changed hands eight times during the war.

Pointing out that attitudes about certain regions of the country are still influenced by perceptions formed during the Civil War, William C. "Jack" Davis, director of programs at the Virginia Center for Civil War Studies (VCCWS) at Virginia Tech, notes that "the Civil War is still with us today." Moreover, as a war that didn't target an external enemy, "It's all ours. It wasn't us against somebody."

"There's just very, very little in our life that doesn't have its roots somewhere in the Civil War," said James I. "Bud" Robertson Jr., Virginia Tech Alumni Distinguished Professor in History and executive director of the VCCWS. Robertson,

who is helping lead Virginia's sesquicentennial commemoration, believes that "one can never understand what the United States is until one understands what the Civil War was."

### Forging a nation

The outcome of the war "settled" two major issues that nonetheless retain a place in the national conversation today. First and foremost, the war ended slavery. Secondly, the war decided the federal-power-versus-states-rights debate in favor of federal powers, thereby forming a United States that until that time had existed in name only, Robertson said.

Decisively, the war put an end to slavery, which eventually led to the civil rights movement that happened in part, appropriately enough, during the Civil War centennial. Slavery, Robertson teaches his students, was unquestionably the



primary cause of the war, even if the original goal of the war wasn't to end it. "For 15 years [before the war], every issue to come before Congress [had] something to do directly or indirectly with slavery," he said.

Despite the passage of 150 years, racial relations in America remain tinged by the war, Davis said, in part because "we're still dealing with those who are trying

to fight the war. There's a current-day agenda that's trying to change history."

The contention over states rights, meanwhile, continues unabated 150 years later, Davis said, with arguments addressing issues such as the health care reform bill and environmental regulations. In Virginia, for instance, some voters are lobbying the General Assembly to support a "repeal amendment" that would allow states to veto federal laws and regulations.

"The debate is still pretty trenchant," said Davis, who compared today's atmosphere to the 1850s, when extremists on both sides claimed their opinions represented the majority of citizens.

"One of the major causes of the war was emotion. We were so young. Half the population back then was under the age of 21 ... and we fought with our mouths," Robertson said. "Now, I'm concerned because we live in an age of negativism. Everything is polarized, or it's politicized."

Frye agreed. "We just couldn't settle our differences through conversation and compromise [before the war]. With today's issues, we still struggle to use conversation and compromise to solve our problems."

The Civil War also precipitated a number of customs and products so common now that Americans give them little thought: standard time to allow railroads to meet shipping schedules; clothing sizes in small, medium, and large; separate shoes to fit left and right feet; the modern image of Santa



Along with a manuscript collection regarded as one of the best outside the Library of Congress, Virginia Tech Special Collections holds a variety of Civil War memorabilia (left), including this daguerreotype of an unidentified soldier (above).

Claus; dehydrated vegetables and canned food; women in the fields of teaching and nursing; and the Medal of Honor. Each one's origin can be traced back to the Civil War.

Militarily, modern soldiers still learn from engagements such as the Battle of Gettysburg, said Lt. Col. William Stringer, deputy commandant of cadets for the Virginia Tech Corps

of Cadets and a speaker at Tech's annual Civil War Weekend. For instance, soldiers in Afghanistan involved in asymmetrical combat—unbalanced forces fighting each other using different tactics—can take lessons from the opening battle at Gettysburg, where an outnumbered cavalry successfully delayed infantry, Stringer said. Experienced commanders also study how a leader 150 years ago made decisions and then apply the lessons to current doctrine.

"What happened in Gettysburg in 1863 is very relevant today," Stringer said. "The fundamentals ... are timeless."

### **Education and research**

In light of the historical and cultural significance of the period leading up to the war, the war itself, and the ensuing emancipation and reconstruction, Virginia Tech and Robertson established the VCCWS in 1999 to facilitate Civil War scholarship and study. Likewise, the expansive Civil War holdings owned by Tech's Special Collections attract researchers and genealogists from all over the country.

Produced for the state sesquicentennial commission, an educational two-disc DVD about the war is just one example of the outreach mission of the VCCWS. The contents are geared toward pre-college ages in hopes that young viewers will discover that while "history isn't necessarily going to make life better," it should help people "understand why life is what it is," Davis said.

www.vtmagazine.vt.edu Virginia Tech Magazine Winter 2010-11 15



Civil War re-enactors Dallas Edwards (left) and Bryan Beard

The center's staff, which consists of Davis and Robertson, also has produced an acclaimed guide for educators teaching the Civil War to secondary school students, several books, and a soon-to-be-launched wiki-style website. Graduate students are digitally indexing Civil War newspaper articles by concepts and thoughts, which should improve search results currently confined to keyword-based queries.

Digitalization has become another crucial research tool for historians. Digital lists of a library's holdings, for instance, or digital images of actual documents help researchers spend their time more efficiently. "It's revolutionized my research," Davis said. "I've found things that I had missed in every book I wrote."

The books in Special Collections number between 7,000 and 8,000, making Tech's Civil War collection among the largest outside of the Library of Congress. The majority of the books were acquired in 1995 when Robertson's friend, Elden E. Josh Billings, ended a 12-year-search for a place to donate his books and several hundred manuscripts by giving them to Tech.

Robert Freis (geography '93), of Roanoke, Va., is one of the beneficiaries of the collection. He has taken friends to battle-fields since the 1980s and now operates a battlefield-tour business, for which he researches first-person accounts to enrich his narratives. Frequently, he's been "astonished and gratified" to find rare, out-of-print sources at Tech. "I feel as fortunate as any prospector who strikes the mother lode and consistently extracts something of great value," Freis said.

As the past continues to shape the present and future, Virginia Tech will continue to play its part in defining precisely why the Civil War holds such a singular grip on the American consciousness.

The sesquicentennial comes to Virginia Tech on May 21, 2011, for a conference on military strategy in the war. So many years after the states became fully united, differences still remain, and Robertson and Davis are keeping their fingers crossed.

"The 150th should be a time when all Americans, all races, all ages, come together," Robertson said. "We'll do the best we can, and we'll make an impression."  $\Box$ 



A page from the sketchbook of Charles Gulager of the 16th Pennsylvania Cavalry, Company A, donated to Virginia Tech Special Collections by Edward G. Fenwick Jr.

# CIVIL WAR NEWS

# LETTERS OF LOVE AMID WAR

Harvey Black, descended from the founding family of Blacksburg, Va., was a surgeon to the Army of Northern Virginia. He wrote to his wife:

"I don't know how much pleasure it affords you to go over these days of the past, but to me they will ever be remembered as days of felicity. And how happy the thought that years increase the affection and esteem we have for each other to love and be loved. May it ever be so, and may I ever be a husband

worthy of your warmest affections.

May I make you happy and in so doing be made happy in return. A sweet kiss and embrace to your greeting."

An unknown Union soldier writes "Hattie" after she responded to his advertisement in a "lonely-hearts" magazine:

"Before proceeding further truth and candor compel me to acknowledge that a little desception was used in the advertisement in the "Waverly." In other words my true description differs materially from the one therein set forth, and may not please you as well as the one "fancy painted," but I thought it was all for fun, therefore funningly gave a fictitious description."

To see the full versions of these letters and more, go to http://spec.lib.vt.edu/cwlove/index.html.

# SPECIAL COLLECTIONS



Among the nuggets in Special Collections:

• A Manual of Military Surgery, picked up off the floor of Chimborazo Hospital in Richmond, Va., the day after the city's surrender. The manual for Confederate doctors includes detailed drawings (above) of how to perform various amputations.

• Narrative of privations and sufferings of officers and soldiers while prisoners of war—with photos of emaciated Union soldiers held at Belle

Island in the James River at Richmond.

• The Rebel Scout, by Capt. Thomas Nelson Conrad, third president of Virginia Tech, recounts Conrad's experiences in the war. The title was later changed to A Confederate Spy.

• Three ledgers from Richmond's Meade & Baker apothecary detailing its business from before the war through 1871. A toothbrush that could be purchased for 25 cents in 1861 sold for \$25 in 1865.

• More than 100 diaries from both sides, including one owned by Tech's first president, Charles Minor.

• Four hundred collections of letters, some of which are available digitally. Students are transcribing others.

• A book of finely detailed sketches by Charles Gulager of the 16th Pennsylvania Cavalry.

# MUSIC AND MEMORIES OF THE CIVIL WAR

Sunday, March 20, 2011 + 3 pm Burruss Auditorium



Back by popular demand, the Department of Music will present a concert of "Music and Memories of the Civil War," featuring the Symphonic Wind Ensemble, choirs, and faculty soloists. James I. Robertson Jr. will serves as narrator for this special event. For more information and to reserve tickets, visit www.music.vt.edu.

# ONLINE CIVIL WAR EXTRAS

Visit www.vtmagazine.vt.edu to see:

A video of Professor Robertson
 on his half-century in Civil War studies

• A slideshow of war memorabilia at Virginia Tech's Special Collections

• A slideshow of a recent Civil War

re-enactors' encampment at the Major Graham Mansion

• Love letters from the Civil War

# James I. Robertson Jr.:

BY RICHARD LOVEGROVE

In October 2010, James I. "Bud" Robertson Jr. was at home when the director of the Virginia State Board of Education called with a warning: controversy had erupted in response to a fourth-grade history textbook passage asserting that thousands of slaves fought for the Confederacy during the U.S. Civil War.

Robertson, Virginia Tech Alumni Distinguished Professor in History and executive director of the Virginia Center for Civil War Studies (VCCWS) at Tech, knew what was coming. As soon as he hung up the phone, a reporter from The Washington Post called—then a local television station and then Fox Radio. After a while, Robertson let his answering machine take the calls.

"It was almost hilarious," Robertson told students in his Civil War and Reconstruction class two days later. "Anyone could figure out it's not true [that slaves fought for the Confederacy]. Patently false.

"Anyway, here we are back in reality," Robertson concluded and launched into his lesson for the day. The native Southerner mixed humor, first-person stories, curious facts, and insight into the psyches of the people who started and fought the war that cost the United States up to 700,000 lives and in large part shaped the nation as we know it today.

Robertson's teaching style and enthusiasm for history have inspired and enthralled students in packed lecture halls since the 1960s. But that facet of his illustrious career will come to an end when he retires in spring 2011. In 43 years, he's explained the relevance of the Civil War to an estimated 22,000 Hokies. Robertson will leave an impressive legacy.

Since coming to Blacksburg, Robertson has written more than 20 books, built the Virginia Tech Special Collections' Civil War research holdings, and produced print and video material that has shaped Civil War history education in Virginia's public schools.

"I've known Bud for more than 40 years, and he was one of my heroes when I was a youngster just getting into the business," said William C. "Jack" Davis, VCCWS's director of programs and a professor of history at Tech."In the state,

he's known as Mr. Virginia Tech and Mr. Civil War. Nothing in the state concerning the Civil War happens without consulting him. He's cast a big shadow over Civil War studies."

Most importantly to Robertson, he has left an indelible impression on countless students.

"The first Civil War book I ever owned was the textbook for [Robertson's class]. Thirty-three years later, I still have that textbook and more than 1,500 other Civil War books," said Albert Mackey (political science '79), who went on to a military career and now lives close to Gettysburg, Pa. "Professor Robertson ignited a lifelong interest in me for the Civil War. ... He's such an engaging lecturer that you want to just sit and listen, and you forget to take notes."

"By far, his class was my favorite class at Virginia Tech," said Kris Berg Risendal (communication '79). "He is the most outstanding teacher I have ever known."

"That's what you spend a lifetime working for," Robertson said of his students' reactions. "I take them by the hand, and we walk down the road to war. I make history human. It's full of emotion. It's not memorization of dates and places."

The Civil War was never far away during Robertson's childhood. He was raised in Danville, Va., the last capital of the Confederacy. As a child, he listened to his grandmother talk about her father's exploits, including surviving Pickett's Charge at Gettysburg. Pursuing a master's degree and doctorate at Emory University, he studied under Bell Wiley, who taught the war through the experiences of the common soldier rather than the generals.

Robertson was just 31 when he was suddenly thrust into national prominence in 1961. President John F. Kennedy was disturbed by regional fractures in the national Civil War centennial observation and was upset that it had become a celebration of war and battles rather than a commemoration. So he purged the commission and tapped Robertson as executive director.

"The feeling was they wanted to bring in a young historian with the energy to go all around the nation and try to

bring everybody back together again. We were seemingly on the verge of another civil war in 1961," said Robertson, who worked with 34 state and 100 local centennial commissions during his tenure as director.

In 1967, Robertson interviewed at Virginia Tech and then accepted the job offer, but not because of the university's reputation in Civil War academic circles. It had almost none; the reputation was his to build.

Robertson's friendship with J. Ambler "Uncle Ambler" Johnston, a 1904 and 1905 graduate and primary architect of the university's neo-Gothic look, prompted Johnston to purchase 1,100 rolls of microfilm containing the compiled service records of all Virginia Confederate soldiers, a donation that suddenly brought researchers and genealogists to Blacksburg in droves. The collection now houses 7,000 to 8,000 books and is considered one of the world's top Civil War monograph collections outside of the Library of Congress, according to Davis and Robertson.

Robertson added his own classic to the collection with the 1997 release of Stonewall Jackson: The Man, the Soldier, the Legend, which took seven years to research and write. "[Robertson's] biography on Stonewall Jackson is the definitive work on Jackson; we understand him as a human being and not as a caricature," said Steven E. Woodworth, professor of history at Texas Christian University. The book was used as the foundation for the portrayal of Jackson in the movie "Gods and Generals," and Robertson served as the chief historical consultant for the film.

Fifty years after his leadership role with the centennial, Robertson is serving on Virginia's sesquicentennial commission and will chair a conference, American Military Strategy in the Civil War, at Tech. In preparation for the 150-year milestone, he served as executive producer of the Emmy-nominated DVD set, "Virginia in the Civil War: A Sesquicentennial Remembrance," which was distributed free to every school in Virginia. "I'm very proud of [the DVD set]," Robertson said. "It's one of my greatest achievements."

Robertson also enjoyed what amounts to a second career in athletics—enough, in fact, to earn him a place in Virginia Tech's Sports Hall of Fame. He officiated Atlantic Coast Conference football for 16 years, served as secretary-treasurer of the College Football Association and president of the former Metro Conference, and was faculty chair of athletics and president of the Virginia Tech Athletic Association, helping guide the Hokies into the Big East and chairing the search committee that

selected Frank Beamer as head football coach.

For his most recent project, Robertson is reworking the 350 radio pieces he recorded over the years for the university's radio station, WVTF, into 151 written pieces for a National Geographic Society book. Moreover, in November, he married Betty Lee, who Hokies might know from her work with Alumni Association chapters. The couple plans to travel the country by train after retiring.

"He is a national treasure," said Richard J. Sommers, senior historian of the U.S. Army Heritage and Education Center at the U.S. Army War College. "One of his hallmarks is his willingness to share knowledge and understanding with such a broad range of people and not just to a clique of Civil War historians or academics. ... Students at Virginia Tech have a great privilege to learn from such a giant in the profession."

Although thousands of Tech students agree, they're not the only ones who will feel a void. "I'm going to miss the classroom," Robertson said. "A professor is as young as his students if he has the right attitude."

Chad O'Kane, M.A. '11 contributed to this story. Go to www.vtmagazine.vt.edu to see a video of Robertson's half-century in Civil War studies.

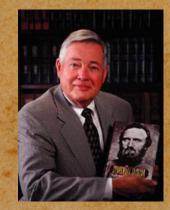


The renowned Civil War expert in his office



# VIRGINIA SESQUICENTENNIAL OF THE AMERICAN CIVIL WAR COMMISSION

### **2011 SIGNATURE CONFERENCE** MILITARY STRATEGY IN THE AMERICAN CIVIL WAR



James I. Robertson, Jr. Virginia Tech Alumni Distinguished Professor Conference Chair

> Saturday, May 21, 2011 Cassell Coliseum 8:30 a.m. - 4:00 p.m.

Lunchtime concert by the Stonewall Brigade Band

The Virginia Sesquicentennial of the American Civil War Commission's third annual Signature Conference will feature noted historians discussing Civil War military strategy in both the eastern and western theaters. You won't want to miss this outstanding program!

### SCHEDULED SPEAKERS:

James M. Bowen William C. Davis Dennis E. Frye

Gary W. Gallagher Joseph T. Glatthaar Richard M. McMurry

James I. Robertson, Jr. Richard J. Sommers Steven E. Woodworth

### REGISTRATION

\$25/person conference and lunch \$15/person conference only



Register online at VirginiaCivilWar.org or call (804) 786-3591



WWW.VIRGINIACIVILWAR.ORG



BY DAVE MILLER PH.D. '10

Young men and women come to Virginia Tech and join the corps of cadets for a multitude of reasons. Some want to start their own business or rise to executive level in government or the corporate world. Many want to fulfill a lifelong dream of serving as a commissioned officer in one of the uniformed services. Regardless of where they want to go in life, cadets know their first priority is to earn a degree in their chosen field which is not an easy task.

The commandant and staff demonstrate their commitment to helping cadets achieve their goals through a robust academic success program that consists of many initiatives tailored to a cadet's specific academic needs.

The program begins the first week of classes for freshmen cadets, when they receive a daily planner and training on how to use it. Freshmen also attend specialized classes addressing time management, detailed planning of the semester, improving study skills, test-taking strategies, rest and recreation management, a mid-semester "reality check," and preparing for final exams. All cadets have an opportunity to study in a quiet environment in the barracks during evening call-to-quarters and can take advantage of on-site tutoring in math, chemistry, and physics.

Cadets who are having difficulty with their academics are counseled and helped with designing a "get-well" program, which includes specialized tutoring. Academic officers—cadets who are academically successful—are assigned at company and

Capt. Jim Snyder, a deputy commandant of cadets, instructs members of the Second Battalion during Cadet Leader School, a leader development class that goes toward the academic minor in leadership studies.

battalion levels and are supervised by the regimental academics officer. These cadets are responsible for identifying cadets in academic need and ensuring that they receive help.

These and other support initiatives comprise the academic success program designed to help cadets reach their academic potential. The goal for the program is an overall corps average GPA of 3.0 or higher. In the spring 2010 semester, the cadets reached that goal, with a corps average GPA of 3.03, a significant achievement for almost 800 students with demanding

Academic achievement is recognized each semester at a regimental awards ceremony. Each company's average GPA is a key criterion for the Gold Cord, awarded annually to the top company. In addition, individual cadets are recognized with the award of a ribbon designating a semester GPA of 3.75-4.0, 3.4-3.75, or 3.0-3.4.

The Virginia Tech community can take great pride in the accomplishments of the cadets in the corps. They have a bright future and, by keeping academics as their first priority, they will undoubtedly realize their goals.

Col. Dave Miller (Ph.D. instructional design and technology '10) is the corps' deputy commandant for leader development.





Students lead world's top collegiate cancer fundraiser

BY HILLARY MAY '12

It's no surprise that the world's top collegiate Relay for Life (RFL) emerged at a university dedicated to service: Hokies want to change the world, and very few are willing to wait until

Having raised more than \$1 million for the American Cancer Society (ACS) over the past two years, Virginia Tech students are hoping to make the 10th annual relay on campus, in April 2011, even bigger.

Edward Spencer, vice president for student affairs and a cancer survivor, delivered the opening remarks at the 2010 relay events in April. After leading the crowd in cheering, "We're beating cancer!" he thanked the event's participants for their spirit of service and for caring about others' survival. His speech's conclusion with the beloved "Go Hokies!" chant spoke to the enthusiasm for helping others that has long driven the student body at Virginia Tech.

The ACS's biggest fundraising event, RFL is also one of the biggest service events on Tech's campus, drawing more than 6,000 students and raising \$578,000 in 2010 and \$507,000 in 2009. RFL stands alongside other projects, such as Fall Day of Service, The Big Event, and VT-ENGAGE, as a tribute to *Ut* Prosim (That I May Serve), the university's motto—and a way of life for many students and alumni.

In 2001, when Virginia Tech first became involved with RFL, the event was run by the Student Government Associatotal was \$25,000. Now, RFL blankets the Drillfield each April, and the planning organization operates year-round as its own registered student organization. In 2009 and 2010, Tech students raised more money for cancer research than any other university relay.

Josh Burnheimer (financial planning '08), assistant director of alumni relations and 2008 RFL director, points to an interesting philanthropic challenge on campus: "It is funny to think that one of the problems we have on this campus is convincing people to donate to your service project ... because there are so many other great causes to support. That is a great problem to have, considering the impact Hokies are having on the world through numerous service projects."

Having adopted its motto in 1896, Virginia Tech has long placed service at the core of its mission. In fact, wearing Chicago maroon and orange, identifying as Hokies, and serving others can easily be termed the "Tech triumvirate." Spencer attributes this commitment to service to Virginia Tech's legacy as a land-grant university. "We are 'the people's school,' committed to serving and providing for all the people," he said.

tion and was held on the Johnson-Miller Track; the fundraising

The 2009 Relay For Life



Jim Dubinsky, director of the Center for Student Engagement and Community Partnerships (CSECP), praises the student-led and student-run projects on campus. He recognizes "the passion and commitment of many people—faculty, staff, students, and community partners—who truly understand the concept of engagement and who have embraced ... [it] as a way of being."

Emily Feeney (communication '11) is the 2011 RFL director, and her work exemplifies the spirit that Tech instills in students. Once appointed to her position in May 2010, her work began. Even while studying abroad in Spain over the summer, she e-mailed other members of the executive committee, searched for bands for the event, and began fundraising and planning. Other members of the executive committee are committing just as much time, calling the chance to serve with RFL a blessing.

They also call it a part of the Tech experience. "Other universities don't encourage their students to be selfless and want to do something more with their college career than just take classes," Feeney said. "Tech does."

Kathryn LeBoeuf, the ACS community manager who works most closely with Tech's RFL, recognizes the impact that the university motto has on students. "Their passion is contagious and constantly inspires me to do more and try harder, but it's not just me. It's everyone around them. ... That motto brings them back to the heart of Virginia Tech."

In the university's darkest days after April 16, 2007, the spirit of *Ut Prosim* held Tech together, serving as both a heart and a backbone for students. Instead of turning inward to mourn, many students reached out. They held the already planned RFL just three days later, celebrating life and hope in honor of those lost, including Caitlin Hammaren, who was the event's top fundraiser that year.

"Our response to tragedy is service and giving back," Feeney said. VT-ENGAGE, a service organization created to honor the victims through volunteerism, challenges students, faculty, and alumni to achieve 600,000 total hours of service a year. April has been designated *Ut Prosim* Month, featuring both RFL and The Big Event, which collectively involve more than 12,000 students.

RFL participants tout "the relay mindset" as a perfect companion to *Ut Prosim*; service is never far from their minds. On Wednesdays throughout the year, students wear shirts to show their support for the cause, with many displaying a bold slogan: "Fight like a Hokie."

Two Hokies who have fought hard for RFL, Kristin Canavera (Ph.D. child clinical psychology '11) and Alice Wagner (psychology '09), have witnessed cancer up close and have personally learned what it means to serve.

As a first-year graduate student, Canavera received shocking news right before Christmas 2008 that her father, David, had been diagnosed with advanced pancreatic cancer. She moved



"Other universities don't encourage their students to be selfless and want to do something more with their college career than just take classes," Feeney said. "Tech does."

back home to be his primary caregiver, managing his pain medications and sleeping in hospitals. "We felt like there was nothing we could do other than try to comfort him because there are currently no effective treatments for pancreatic cancer ... but I couldn't sit back and do nothing," she said. Her father's battle with cancer lasted only four-and-a-half months.

Canavera's response to a dismal situation was to find hope by helping others. She joined RFL and in her first year raised nearly \$12,000 as a tribute to her father. Now, she is serving a third and final year as a member of the RFL executive committee, as well as organizing the first Cancer Research Symposium, which will take place on campus the week after the 2011 relay to highlight cancer research at Tech. She is also a nationally ranked RFL fundraiser, a designation bestowed upon the top fundraisers across the country.

Canavera sees her service work not only as deeply personal but also as an important part of what she learned at Tech. "My education here has trained me well in research and clinical skills within the clinical psychology Ph.D. program, but perhaps the most valuable lesson I have learned and will also take with me has been my experience of [following] through on *Ut Prosim*," she said.

Wagner also has seen firsthand what it means to "fight like a Hokie." She began her involvement in RFL as a freshman with her Alpha Phi sorority sisters, but the cause hit home when her mother was diagnosed with stage IV nonsmall-cell lung cancer just seven days before Wagner began her sophomore year. Over the next three years, Wagner's involvement with RFL intensified, from a participant to a committee member and finally to co-director her senior year. Because of the students' efforts along with Spencer's, the event was moved to the Drillfield, reminding people that service is at the heart of campus.

Wagner, whose mother walked in the Survivor's Lap each year and inspired her daughter to keep serving, described the importance of RFL and its emotional impact on her family.

"[My mother] fought hard enough that she and my dad were able to come up to Virginia Tech Relay For Life and walk in the Survivor's Lap. ... It was an incredibly emotional experience to join her on the track as her caregiver."

Wagner's mother outlived her three- to four-month prognosis because of her tenacity and clinical trials resulting from cancer research funding. Though her mother died in April 2010, Wagner said that her mother's relentlessness is still her inspiration to continue the fight.

"Without the Virginia Tech Relay For Life and the incredibly service-driven students at our great university, I don't think my mom would have been able to see me walk across the stage at graduation," Wagner said, adding "[I am] forever thankful for the impact that Hokies made on my life."

Wagner continues to follow the spirit of service fostered at Tech; she joined Teach For America after graduation and is teaching third grade in Nashville, Tenn., while continuing her work with ACS as a mentor to RFL chairpersons at Southeastern Conference schools.

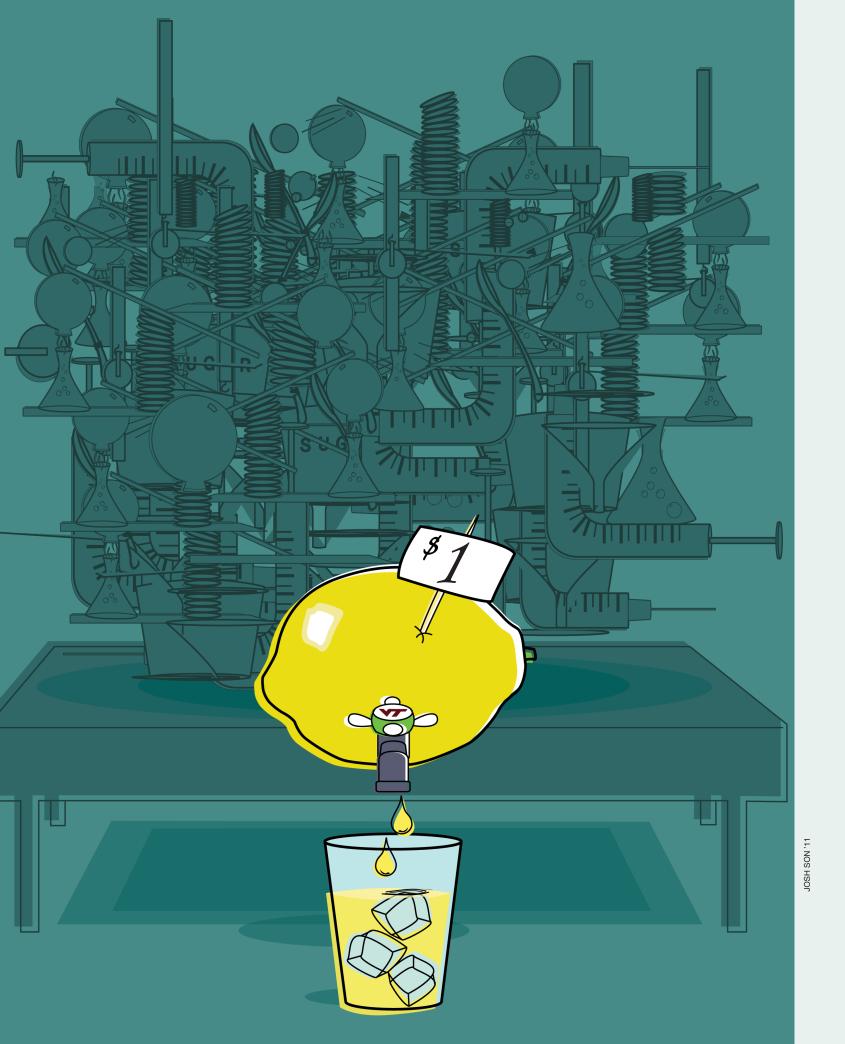
Other Tech RFL alumni have taken to heart their service while in college and have continued after graduation. Burnheimer, who along with his younger brother helped enhance Radford University's RFL program, is still involved with ACS at the national and local levels.

Tech alumni continuously prove that *Ut Prosim* is not simply a university motto but a life motto that students carry with them long after leaving campus.

"When dedicated Hokies put their minds to something," Burnheimer said, "it not only will be completed but will be better and bigger than anyone imagined."  $\Box$ 

Hillary May (English '12) is a Virginia Tech Magazine intern. To read more and see videos about the relay at Tech, visit www. vtmagazine.vt.edu.

Virginia Tech Magazine Winter 2010-11 25



# Risky business **Hokies entrepreneurs thrive in trying times**

BY CHAD O'KANE M.A '11

The Great Recession has sent ripples of economic woe across the globe. With national unemployment figures hovering near 10 percent, sustained unemployment and underemployment have affected people from all walks of life. Even the long-held belief that more education makes one more marketable has been called into auestion.

In response to times of prolonged unemployment, a renaissance of new small-business development often occurs. Not surprisingly, innovative Hokie alumni, sensing opportunity where others see only bleak economic forecasts, are harnessing the unique spirit of the entrepreneur.

### **Opportunity knocks**

Aaron Herrington (finance '00), co-founder and director of client services for Modea Inc., a digital services agency in

Blacksburg, Va., is proof that entrepreneurial success can be achieved in a down economy. Modea provides strategic, marketing, creative, and technology services to a diverse group of recognizable consumer brands, including watchmaker Seiko and Sharp Electronics. Founded in 2006, the



company has grown by more than 1,300 percent in just three years and was ranked by www.Inc.com as the 221st fastestgrowing private company in America in the website's "2010 Inc. 500|5000" ranking.

Seizing opportunity, according to Herrington, makes all the difference in the world, for opportunities don't arise every day. "Starting this business 15 years ago would not have been possible because digital [media] had not yet become so entrenched in consumers' daily lives the way it is today," Herrington said. "This was a once-in-a-generation type of opportunity, and we jumped all over it."

Attention to even the most-minute details is one key to

success for a small business, Herrington said. "We realize that decisions that might seem small can actually grow and evolve into much bigger opportunities."

Big-picture thinking is also paramount in achieving success in the long run, Herrington added. "We are always thinking from a long-term perspective. If something looks good in the short term, but not necessarily in the long term, it's probably not a good business decision, despite how enticing it might be," he said. Herrington said that Modea is showing no signs of slowing down, with plans to double in size in the next year.

### **Conventional wisdom debunked**

Starting a business in an economic climate like today's might seem more preposterous than logical. David Lohr (chemical engineering '76), executive director of the Virginia Biosciences Development Center, claimed, however, that new ventures actually make a great deal of sense in trying times. "Without question, in an environment like this, we're seeing a resurgence of entrepreneurship," Lohr said. "All of these displaced executives are finally taking the opportunity to pursue their dreams and run their own businesses."

The risk for these budding entrepreneurs, Lohr explained, is greatly reduced, as they've often already lost their jobs. Furthermore, the resources necessary for a start-up, such as payroll services and legal fees, can be successfully negotiated to help new businesses run more efficiently. "Buildings are empty, lawyers

are hungry, and people just want a job," Lohr said.

While working for a large engineering firm in California, Sharon Lu (industrial and systems engineering '03) kept her entrepreneurial spirit sub-



dued, hesitant to venture out on her own without job security. After being laid off in the spring of 2009, she finally decided to act upon her dream and started ecoVegan, which provides affordable and natural vegan food.

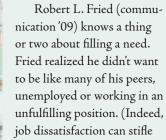
"I was considering quitting my job to started this company," Lu said. "But once I lost my job, I decided the timing was perfect to fulfill my dream of serving the public and promoting a compassionate and sustainable lifestyle."

Lu said the purpose behind ecoVegan is to educate the public about how diets impact health and the environment. "Every sale makes a difference for health, animals, and the environment," she said.

By combining passion and commitment with a unique idea, Lu was able to attract a financial partner, making the start-up feasible. The initial investment, she said, can often be the toughest hurdle.

While attracting start-up capital can be a challenge, Lohr conceded, the government is helping to mitigate this difficulty by pumping federal stimulus money into entrepreneurial endeavors through grants and small-business loans, particularly those endeavors in emerging sectors that help solve problems, such as green technology. For a business idea to be successful in attracting any kind of funding, Lohr said, the potential business

has to fill some kind of need.



innovation. According to polls conducted by the Conference Board, a global business-membership and research association, fewer than 45 percent of Americans are satisfied with their After studying abroad in Beijing during his final semester

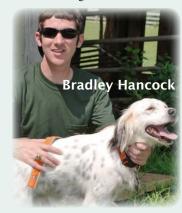
at Virginia Tech and noticing what he considered a lack of study-abroad opportunities in southern China, Fried looked to create his own program. Though undertaking a daunting task, Fried credits the entrepreneurial spirit instilled by coming from a family of small-business owners. "I'm a third-generation entrepreneur, so I think I was prepared for [the challenge]," said Fried, who has pushed himself to become fluent in Mandarin

Fried co-founded The Chinese Language Institute, which is officially affiliated with Guangxi Normal University and promises a total immersion experience in Chinese culture. Students receive intensive, one-on-one Chinese language instruction, participate in a variety of excursions around the country, and have the option of living in integrated housing with Chinese graduate students.

Setting your product apart from others is key to any successful endeavor, Fried said. "Compared with other studyabroad programs, we take a unique approach by putting equal emphasis on the living environment and the educational experience," he said.

Entrepreneurs are not always looking to start the next Fortune 500 company. In fact, many start a business in an effort to share their passion for a particular hobby or interest while earning supplemental income. Such motivation prompted Demas Boudreaux (M.A. political science '06) and Bradley Hancock (mechanical engineering '06) to launch Commonwealth Birding to provide expert-guided quail hunts in Virginia.

Although Boudreaux and Hancock both have day jobs, they share a passion for Virginia, the outdoors, and hunting and attempt to imbue every customer experience with that energy. "We are firm



### "Part of our job as educators is to cultivate the entrepreneurial spirit."

believers in the motto, 'Do what you love, and you'll never work another day in your life," said Boudreaux. The entrepreneurs recovered their initial investment within months and have already expanded into outdoor clothing.

### **Shaping entrepreneurs**

These Hokies credit the various lessons learned at Virginia Tech with the success they've achieved as small-business owners. Not surprisingly, faculty members in the Pamplin College of Business are doing what they can to cultivate the next crop of successful entrepreneurs. For its part, the Department of Management places a strong emphasis on a practical, handson approach in a variety of courses in the entrepreneurship, innovation, and technology-management option.

Management Professor Devi Gnyawali teaches a course on entrepreneurial leadership and innovation in which groups of students identify business ideas, conduct feasibility studies, and create and present comprehensive business plans. "Learning by doing is the focus of this course," said Gnyawali.

The key, he said, is for the students to first find an idea that will fill a need in society and then determine the feasibility of such an endeavor. More importantly, the students must possess enthusiasm for their idea. "If they don't choose an idea that they're passionate about, it won't make for a very good project," Gnyawali said.

Having owned a business and consulted for small businesses before teaching at Virginia Tech, Reed Kennedy, instructor of management and director of international programs for

Pamplin, brings a unique perspective to his small-business consulting classes. He knows the myriad skills one must possess in order to be a successful entrepreneur. "We look at marketing, accounting, finance, writing, operations, and anything else you need to run a successful business," Kennedy said. "You've got to know how to do it all."

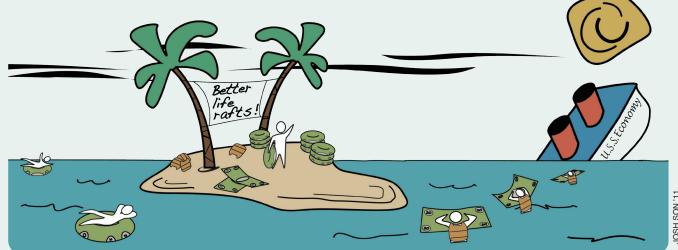
Kennedy believes that the U.S. educational system does not place enough emphasis on entrepreneurship. An entrepreneurial spirit and a willingness to take risks and start something new, he said, are very important, whether establishing a firm or working for a big company.

"Through culture and education, we've done a disservice, preaching that you go to school and then go get a job with a big company that provides good benefits," Kennedy said. "Part of our job as educators is to cultivate the entrepreneurial spirit." That spirit, after all, is a significant thread in the fabric of this country and will ultimately help us climb out of the Great Recession, he said.

Chad O'Kane (M.A. communication '11) is a graduate assistant with Virginia Tech Magazine.

To learn about the Alumni Association's new alumni career resources program, see page 45.

If you had \$1 million, what sort of business would you start? Hear answers from campus in a student-narrated video at www. vtmagazine.vt.edu, where you can also find a link to the Online Business Guidebook, a publication by Pamplin students that is reaching entrepreneurs around the world.



Virginia Tech Magazine Winter 2010-11 | 29 www.vtmagazine.vt.edu

# Talent Shows

Honor courses pair top-notch students and teachers

BY PHILIPP KOTLABA '12

When Charles "Jack" Dudley took the reins of the University Honors Program in 1990, one of his most significant initiatives was to establish what would later become the colloquium series.

The series is taught by distinguished faculty and brings together a diverse group of students to study topics from Chinese medicine to the philosophy of food. These courses often become a hallmark of Honors students' undergraduate studies. Further development of the colloquia has prompted university administrators to return to the classroom to teach, while some students have also decided to instruct their own courses.

From designing innovative science museum exhibits to leading service-learning expeditions to Honduras, students exemplify the program's role as a creative hub that enriches the academic experience at Virginia Tech.

### **Bringing Science to Life**

For the Bringing Science to Life colloquium, Virginia Tech harnessed the energy of its Honors students as the architects of new, revolutionary exhibit designs for the Science Museum of Western Virginia in Roanoke, Va.

Originally taught in spring 2009 by Alumni Distinguished Professor Arthur L. Buikema Jr. and Virginia Tech Provost Mark McNamee, the colloquium offers insights for museums struggling to move forward in the era of Google and Twitter. It's also a testament to the synergy created by pairing top administrators and faculty with high-performing students.

"When the suggestion was made that we pair administrators with distinguished faculty members, I thought it was a great idea, and I volunteered to be part of the experiment," said McNamee, who had previously helped start a science museum at the University of California, Davis. "I thought, 'What a great way for us to combine forces and work with a group of students to see how they could get involved.""

"Let's let them design an exhibit," Buikema recalled thinking, "and now they've got to think about age, ethnicity, educational background—all the things that are real [considerations] for scientists in communicating what they do."

During its first semester, the colloquium pulled in about a dozen first-year students to invigorate the image of the Roanoke museum. The museum is now in the final planning stages of a comprehensive \$27 million renovation that will start in summer 2011, with a projected re-opening in spring 2013. The plans incorporate many of the students' concepts.

The students started by visiting the science museum to survey visitors. Some exhibits involved parents but alienated the kids, or vice versa. Children were especially attracted to hands-on pieces, such as a tornado funnel, or a river exhibit with horseshoe crabs, which included an employee on hand to answer questions. By the time visitors arrived at the crystal or fossil room, though, nobody seemed too excited.

During their investigation, students discovered that museum visitors want clear, visual answers, not rows of text-filled plaques. Scientists, however, are loath to oversimplify their work, according to McNamee, a trained biochemist. "I had the same problem," he admitted. "I thought there were too many words, and when the students mentioned it, I even noticed it more. I realized that I wasn't reading [plaques]; I just started [interacting with the exhibits]."

Larry Bell, senior vice president for strategic initiatives at the Boston Museum of Science, said that the role of the science





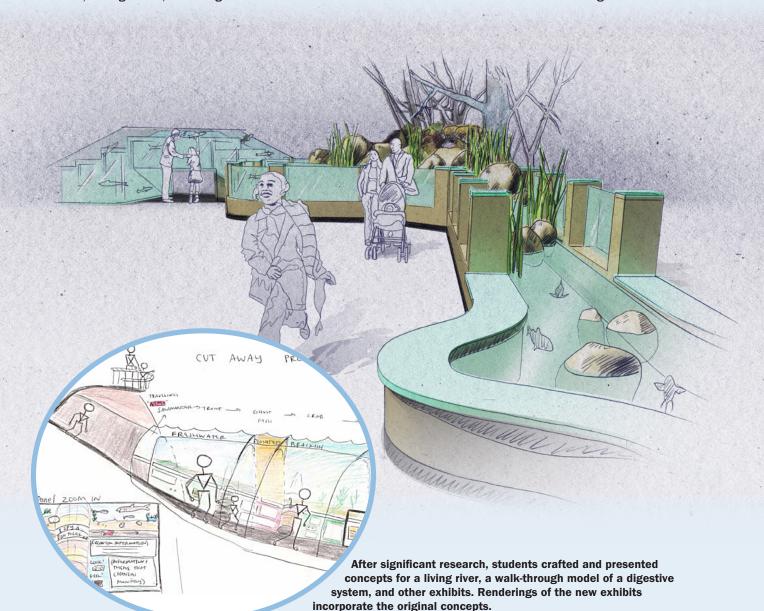




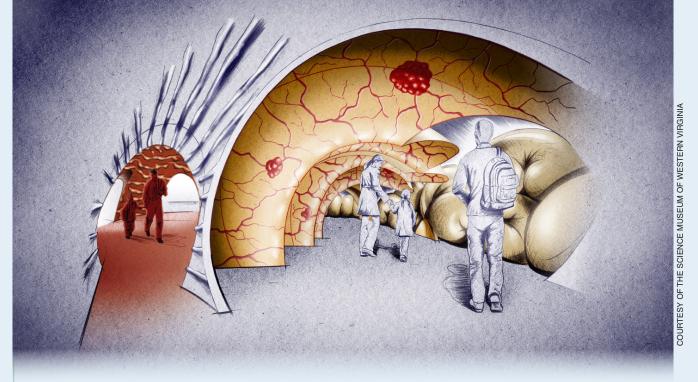




Talent was on full display when Alumni Distinguished Professor Arthur L. Buikema Jr. (far left) and Virginia Tech Provost Mark McNamee (far right) asked Honors students (left to right) Carly Stephens, Darius Emrani, Philipp Kotlaba, and Arielle Kohr, among others, to redesign exhibits for the soon-to-be-renovated Science Museum of Western Virginia.



Www.vtmagazine.vt.edu



Rendering for a walk-through digestive system

museum half a century ago was far different from today. "It was basically a place where you could go and see something you'd maybe heard about, but you'd never seen," he said, noting that museums' goals have since "shifted from knowledge to stimulating your curiosity, and maybe motivating you to want to learn more. ... Those learning opportunities work for people of all ages."

With that perspective in mind, the students worked in teams to create design presentations that were delivered to classmates and then to museum staff and exhibit consultants. Ideas that originated from that first semester included a walk-through gastrointestinal tract, a sustainability simulator, and a Ripley's-style aquarium to showcase local riverbed ecosystems—ideas that have evolved and now appear in the museum's renovation plans.

Museum Director Nancy McCrickard referenced ancient Chinese philosopher Confucius: "I hear and I forget. I see and I believe. I do and I understand." McCrickard said the students quickly grasped this concept; the high level of thought was plainly evident. "[This younger] age group is where some of the more creative ideas are going to come from."

John Good, an exhibit producer who, as president of Exhibit IQ, is working with the museum on the renovation, said he was delighted with the students' ideas. Often, museum designers are reluctant to include others in the creative process. To his knowledge, partnering with students in this way hasn't been done before Colloquium Americanum in the industry.

"The fact that we stepped out of that prism ... the product of [their] creativity definitely shows," Good said. "A lot goes into this. It's more complicated than it looks on the surface. From my point of view, I clearly saw that [the students took] all of the [appropriate] parameters into considerations and came up with some very reliable concepts."

The colloquium was repeated in the fall 2009 semester, with

some of the original students returning as tutors. The class will enter its third iteration in spring 2011, and the partnership has been a catalyst for discussions between the university and the museum about future collaboration.

"The progress that was made just totally blows my mind," said Buikema, who teaches ecology, environmental science, evolution, and systematics. "One of the mistakes we make as instructors is we think we know it all and students really don't know much. In reality, students know a lot, and they are very capable individuals; we just haven't given them the freedom to contribute."

Arielle Kohr, a human development major who participated in the colloquium as a freshman in fall 2009, worked on a team to produce an exhibit idea based on the human reproductive system. She entered the class hoping to gain a new perspective on science and teaching, and she emerged with the thought of interning at the Smithsonian museums.

"The thing that I like the best is that [the subject] was a complete field of work that I had never even considered before, but found that I think I was relatively good at it and would want to pursue that in life, depending on where my work takes me," Kohr said. "[The class] allowed me to use my creativity to its fullest potential, and to get out of the test-taking mode and [apply] practical skills in order to create something that could be put to use."

According to Terry Papillon, Honors director and professor of classics, much of the vitality behind the colloquium series is due not only to exemplary faculty, but also to the competitive mindset inherent in such a diverse group of students. "One might be an engineer, one an architect, one a historian, one a French major, one a dairy science major," Papillon said. "You are faced really vividly with the idea that people think about things differently."

The science colloquium is just one example. In other instances,

students have taken the initiative to establish their own course, whether it be rallying their peers to explore a common interest or fulfilling the spirit of the university motto *Ut Prosim* (That I May Serve).

Ross McFarland, now a junior architecture major, was a freshman when he enrolled in a colloquium examining the history of the city, taught by President Charles W. Steger and Paul Knox, senior fellow for international advancement. The next year, McFarland attended a colloquium on suburbia taught by a fellow architecture major, then decided to lead his own course on American transportation.

His spring 2010 Colloquium Americanum helped engineering and philosophy majors alike examine how transportation has influenced American communities.

"Honors trusts the students to really pursue academic goals or interest areas with vigor," McFarland said. "This [freedom] gives you the opportunity to pursue what you're interested in, with other people, gaining other viewpoints and other perspectives." McFarland's work has been influenced by that first city colloquium, and he hopes to expand the course in future years to such themes as education and national security.

Commonly in the Honors Program, a singular experience will propel a student toward a career, Papillon noted. Colloquiaand awards such as the sophomore scholarships, which provide \$10,000 for a study-abroad trip—strive for that very goal.

### Ut Prosim El Porvenir

It was the water in El Porvenir, Honduras, that caught the attention of Emily Barry. After participating in a spring 2008 colloquium, taught by accounting professor Brian Cloyd, that

involved creating a service-learning project, Barry, now a graduate student in international affairs and graduate assistant with the Center for Student Engagement & Community Partnerships, traveled to the rural Honduras town. Noticing that the citizens had come together around certain issues such as water sanitation, Barry got the idea to enlist others to establish a partnership between the village and Virginia Tech. Colloquium students

wrote grant proposals, held fundraisers, and secured an \$11,000 grant from a donor to make their ideas a reality.

Three more trips and five semesters later, the Ut Prosim El Porvenir colloquium—the town's name translates from Spanish loosely as "the future"—has involved nine Tech students, some of whom have traveled to Honduras more than once to advance projects such as water sanitation, computer education, women's



Students have traveled to Honduras several times to advance projects such as water sanitation, computer education, women's empowerment, and firefighter training.

empowerment, and firefighter training.

Honors trusts the students to

really pursue academic goals

or interest areas with vigor,"

McFarland said. "This gives you

you're interested in, with other

people, gaining other view-

points and other perspectives."

Members of the group also found time to immerse themselves in the community of El Porvenir. A couple of student joggers inspired a village exercise class that included nutrition lessons taught by a nutrition major. A Honduras vs. United States soccer match turned into a community event that attracted more than 200 villagers, complete with vendors. (Honduras won.)

Participants in the colloquium also had to confront more difficult themes, such as examining the effects of neoliberalism in Honduras. Dole Pineapple Company employs 70 percent of El Porvenir workers, presenting an interesting case study of how globalization affects the local economy.

"I just ate a pineapple—I had a little fruit cup for lunch. What does that mean? How is that affecting the poverty of these people?

What are the politics behind that?" Barry asked. "Having discussions like that and then being able to go down there and see Dole, and see how [the company] pollutes the rivers, but also gives people sustenance—it's difficult; it's the opportunity to pursue what hard to find concrete answers."

> The Honors Program's official motto, "Excellence is in the journey," suggests that asking the right questions is what really matters. As laboratories for new ideas, these colloquia and

many others are empowering students to meet the challenge posed by the program's unofficial motto: "Make yourself interesting."

Philipp Kotlaba'12, an Honors student majoring in psychology and international studies with a minor in German, participated in the Bringing Science to Life colloquium. He is a senior news editor for the Collegiate Times.

Virginia Tech Magazine Winter 2010-11 | 33 www.vtmagazine.vt.edu

## Cool Weather Hokie Gear





Professor profile, continued from page 11



Polished and organized, Amateis overcomes the oftendaunting challenge of maintaining student motivation and attention in a large lecture class. And she does so without compromising content.

"Patricia is the heart and soul of this program," said Joe Merola, professor of chemistry and former department chair. "In exit interviews, graduating seniors invariably mention her as one of the best teachers they encountered during their time at Virginia Tech."

"I'm not sure what makes me a good teacher," Amateis said. "I really like the subject, and I really like the students. They pick up on my enthusiasm." She noted that her philosophy is to explain things the way she would want them explained to her.

Chemistry is a hard subject, Amateis admits readily. She is also quick to add that students who devote time to the class do well in it. "I tell my students that luck doesn't get you through this class or most anything else in life," she said. "It's about getting out there and doing the work."

On course evaluations, her students consistently agree. "Dr. Amateis is a professor who wants everyone to succeed," wrote Chris Wolberg, a junior biochemistry major from Alexandria, Va. "Her patience with students who are having trouble makes her an excellent teacher."

Colleagues also consider her as one of the best. "I was struck immediately by Patricia's control over such a large class," said chemistry Professor T. Daniel Crawford. "It was clear that she had gained the students' respect early in the semester, and they responded immediately to her lead to quiet the room for the start of class. This is no small achievement."

Amateis also advises her students to have a passion outside of academics. Her own interests include playing music in a steel-drum band, a hobby she took up two years ago when her youngest child left for college. A far cry from what some might call the torture of chemical equations, the steel drum gives her another activity in which to excel.

"I've always been a hard worker, and whatever I do, I want to do well, or at least to the best of my ability."

Catherine Doss is the communications manager for the College of Science.

Go to www.vtmagazine.vt.edu to hear the Amateis interview.



# Endowing academic flexibility

**Funds help** departments excel

BY ALBERT RABOTEAU

**Philanthropy** 

In 1976, when he created the first professorship endowment in his alma mater's College of Engineering, Charles O. Gordon Sr. (industrial engineering '42) appreciated that the benefits of his generosity would last beyond his lifetime.

That fact was driven home in August 2004, when G. Don Taylor became the latest Charles O. Gordon Professor of Industrial Engineering just eight days after Gordon had passed away.

Taylor never got to meet his benefactor in person, but the Gordon professorship was an important factor in Taylor's decision to leave the University of Louisville to become the head of Virginia Tech's Grado Department of Industrial and Systems Engineering. Under his leadership, the department has received the highest rankings in its history: U.S. News & World Report ranked the department fourth in the nation in 2010 for both undergraduate and graduate education. Taylor said this success reflects the quality of students and faculty but also was fueled by the generosity of people like Gordon.

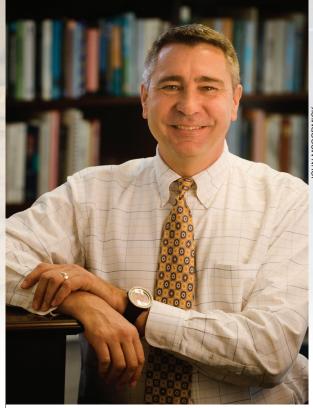
Taylor is one of many renowned professors in his department, which has five other faculty members with named

professorships or fellowships created by donors. Named professorships typically provide faculty members with discretionary money, which gives them the flexibility to explore new initiatives that otherwise would need to be paid for from their department's budget or with conditional funding from an outside agency.

"As a department head, having a named position is particularly useful," said Taylor, whose research expertise is in using computer simulations and advanced math to plot optimum trucking routes."I have a lot of travel demands in order to represent the department and do my job effectively. If I didn't have funding from the professorship, I wouldn't be able to do my job as efficiently."

Along with his academic duties, Taylor has helped improve trucking plans used by major transportation companies. He is president-elect of the Institute of Industrial Engineers, the world's leading professional society in that field.

Donors who want to ensure that a sizable gift will benefit the university for many decades to come can stipulate that only income from the gift, not the principal, be spent. The Virginia Tech Foundation, which manages money donated to the university, oversees roughly 3,000 endowments created in this manner.



G. Don Taylor

According to the foundation's records, the oldest endowments are two scholarships created in the late 1940s, and the first named professorships were endowed in the 1970s.

Former Virginia Tech President Paul Torgersen was dean of the College of Engineering in the 1970s and developed a relationship with Gordon, a successful alumnus who would later serve on the Virginia Tech Board of Visitors. Torgersen said he sought Gordon's advice on fundraising for what would become the college's first endowed professorships and wound up with a donation to create one.

"Once we got started, there was an incredible momentum," Torgersen said. "But we had to get the first one, and Charles Gordon gave us the first one."

Today, a majority of endowments still support scholarships, but many funds have also been set up to benefit particular programs, provide research opportunities for students, bring

speakers to campus, or establish professorships like the one used to recruit Taylor. Across the university, plenty of other department heads can cite endowments that help their programs.

As Taylor explained, he wanted to come to Blacksburg for many reasons, but the availability of a named position certainly helped cement his decision.

"I had a named position at Louisville," Taylor said, "and once you've had the freedom that comes with that, it's hard to give it up."

Albert Raboteau is a writer for University Development.



Two-thirds of the roughly 3,000 endowed funds at Virginia Tech pay for scholarships. Christian Hendrix (biochemistry '12) is one of many students helped by one of the oldest endowments on campus, the William B. Downey Memorial Scholarship, created in 1949. Visit www.campaign.vt.edu/ downey for her story.

Virginia Tech Magazine 37 www.vtmagazine.vt.edu

# Say hello to the future.

## Campaign volunteers mobilize for Virginia Tech

BY ALBERT RABOTEAU

Elaine Tyrrell stood before a crowd and discussed why she had willed her estate to her alma mater, Virginia Tech. She encouraged the group, more than 30 alumni and friends, not only to give generously, but to urge others to do the

That September 2010 meeting in a hotel conference room in Greenbelt, Md., was a milestone in the Campaign for Virginia Tech: Invent the Future. With the initial gathering of members of the Washington, D.C.-Maryland Regional Committee—the last of 16 assembled over the

past four years to help the university reach its \$1 billion campaign goal—a nationwide effort to mobilize the university's supporters was fully under way.

"It's Hokies talking to Hokies," said Tyrrell (clothing and textiles '65, M.S. home economics '67), the committee's chairwoman, a few weeks after the meeting. "Regardless of class year, we're bonded. We get reacquainted, we reminisce, and synergy is created. We draw on this synergy to create a piece of Virginia Tech's future."

The university's regional committees are based in Florida, California, Texas, New York, and population centers closer to Blacksburg.

Regional work is complemented by the efforts of the National Campaign Steering Committee, which has helped drive the campaign since its public launch in October 2007. Prior to that, the



Elaine Tyrrell, chairwoman of the D.C.-Maryland Regional Campaign Committee, at the committee's first meeting

Quiet Phase Campaign Steering Committee had helped secure more than \$550 million in gifts and commitments between July 2003 (when the fundraising initiative began) and the public launch.

By spending countless hours promoting the university and making significant gifts themselves, committee members have fueled much of the campaign's success to date.

Combined, the campaign's 907 volunteers donated or pledged more than \$265 million between the start of the campaign and mid-October 2010. As a group, they've dedi-

cated more than 10,000 hours to committee events, and that figure doesn't even include time spent contacting friends, colleagues, and

Steve Parker (accounting '83) is a member of the committee focused on the Charlotte, N.C., region. He helped organize and provide seed funding for an endowed fund that Wells Fargo employees are using to pool support for the university. He's also made numerous phone calls and set up meetings with fellow alumni.

"A lot of these folks I don't know personally," Parker said. "But once people understand that I went to Tech and realize what I'm doing by reaching out to them, they're certainly willing to talk."

Albert Raboteau is a writer for University Development.

Visit www.campaign.vt.edu/volunteers for a list of campaign committee members and to read why they chose to become involved.



Meet Emily Barry, a 2009 graduate of the College of Liberal Arts and Human Sciences, who now is working toward a master's in international government and international affairs in the College of Architecture and Urban Studies.

Emily organized a service-learning project that took her and several fellow students to rural Honduras, where they partnered with residents on much-needed community programs. Emily says the experience helped cement her desire for a public service career in which she can continue to help others.

A donor's generosity made it possible for Emily to turn her project from idea to reality. By giving to Virginia Tech, you help fuel the accomplishments of extraordinary students like her — talented, ambitious young adults who are certain to make a positive impact on the world. Visit **www.givingto.vt.edu** to make a gift or learn more.

Virginia Tech Office of University Development (0336) University Gateway Center, Blacksburg, VA 24061 540/231-2801 or 800/533-1144 | www.givingto.vt.edu



**Alumna Profile** 



### **Cultural kaleidoscope**

Alumna serves as ambassador to two island nations

BY DENISE YOUNG

Many Americans may not be familiar with the Republic of Mauritius, an island nation of 1.2 million, east of Madagascar in the Indian Ocean, or the neighboring Republic of Seychelles, a scattered archipelago of more than 115 islands.

Tourists to Mauritius can ride giant tortoises or bask in the sun. The republic's rainbow-hued flag is as vibrant as its culture, reflected in brightly colored buildings, statues, and temples across the country. Seychelles was recently featured on the television show "Amazing Race."

But Mary Jo Wills (M.B.A. '94) isn't on a vacation or reality show. As the U.S. ambassador to Mauritius and Seychelles, Wills spends most of her time in Port Louis, Mauritius' capital city, representing U.S. interests and helping to shape relations with these two island nations. "The opportunity to serve as ambassador is the pinnacle of any professional diplomat's career. And it is an honor and privilege to serve the government and people of the United States," said Wills, who has held the post since February 2010.

The nations have a history as colorful as their tropical landscapes. Uninhabited for much of human history, both countries were French and British colonies. Citizens have ancestries stretching to Africa, India, China, France, and Great Britain. It's typical for citizens to speak as many as three languages, but

"Real communication involves dialogue face-toface. The only way to communicate effectively is to know those circumstances, the history, and the people involved and to listen to them."

most speak similar versions of Creole. Religious beliefs vary from Hinduism to Roman Catholicism to Buddhism.

Wills' job is varied as well. "Every day is different, every day is challenging, and every day is very interesting," she said. Because of the eight-hour time difference, her mornings are often spent catching up on what transpired in Washington overnight. Staff meetings, speeches at conferences and cultural events, or sessions with policymakers, business leaders, colleagues, or the prime or foreign minister of either country ensure that she stays busy.

While she enjoys meeting new people, learning about other cultures, and telling others about the United States and shared values and goals between nations, Wills never forgets the importance of any ambassador's mission. "When we're overseas, what we're really doing is being a bridge between the people of the United States and the people of other countries," Wills said.

The presence of a U.S. representative allows for substantial conversations that wouldn't be possible otherwise. "It is easy to simply put out a message or make a statement—that can be done from Washington," said Wills. "Real communication involves dialogue face-to-face. The only way to communicate effectively is to know those circumstances, the history, and the people involved and to listen to them, as well as talk. [This commitment requires] people on the ground who know how to communicate with our friends abroad and who know how to communicate with Washington."

A graduate of Tech's M.B.A. program, Wills is also pursuing her doctorate in public affairs and public administration at Virginia Tech's Center for Public Affairs and Policy (CPAP) in Alexandria, Va. "The doctoral program has given me a whole different perspective on my work," Wills said.

Jim Wolf, a CPAP professor who has known Wills for more than seven years, said he is most impressed by her curiosity and



tenacity. "She stays with something and keeps pushing. She's very adaptable to different situations. She is a very competent scholar and practitioner."

That adaptability has been a must for Wills, who has lived in Mali, Mexico, Nigeria, Niger, Saudi Arabia, and Italy. Among other roles, Wills has served as an acting assistant secretary in the state department's Bureau of African Affairs and as director for the Office of Southern Africa Affairs. "I didn't really choose my career in the usual sense. I didn't know about the Foreign Service until my husband joined in 1979, and I was recruited by one of his colleagues," Wills said.

Wills doesn't worry about culture shock. In fact, one might say she thrives on it. "It is always an adventure to move to a new country. You pack up a lot of what you own and then live without it for some time as it is shipped to you. But there is the compensation of living in a new country that you get to discover—and [you] make new friendships that often last a lifetime."

For Wills, that sense of discovery goes hand in hand with a mission to serve as a bridge between cultures, fostering crosscultural understanding and anticipating a new adventure—and challenge—every day.







### Commentary

Much is happening in our Alumni Association this academic year, including the recent celebration of our 135th birthday. At one occasion, we inducted former alumni board members into a new recognition society, the Gate-



way Society. Since the founding of the Alumni Association in 1875, several hundred loval alumni have served on our governing board. We are grateful for their service in the true spirit of Ut Prosim (That I May Serve).

New among our offerings this year is a career resources program for alumni. Nancy Brittle (mathematics '72), an alumna who spent her career

with IBM, has accepted the role of organizing and facilitating online resources designed to help alumni searching for employment. Information regarding résumés, interview tips, networking, and even job listings are part of the service. At no cost, employers may post job listings seeking applicants online at Hokie Nation Network. Webinars are planned on topics such as entrepreneurship and business trends. These resources, we hope, will be helpful to alumni at any stage of their careers. (See page 45 for more information and the Web address.)

Also new in 2011 is a Drillfield Series of five "seminar" weekends for alumni showcasing the expertise of faculty and alumni. For example, in February, we'll offer tips on preparing fine cuisine and pairing it with the appropriate wine. Another weekend is for photography aficionados or beginners, featuring professional and award-winning photographers. Still another embraces sustainability by presenting topics and tours associated with livestock, crops, food production, and safety. The arts, particularly theater, will be center stage for a midsummer performance. The popular Summer Around the Drillfield concludes the series with a four-day program that includes Blacksburg's annual Steppin' Out festival and a visit to historic Mountain Lake. The Inn at Virginia Tech offers discounted rates to those seeking accommodations for the Drillfield Series. Learn more about the series and the activities planned for specific dates on page 44.



Steppin' Out in downtown Blacksburg

Finally, a wide selection of group tours is being offered by the Alumni Association in 2011. Several will be hosted by distinguished deans and faculty members, such as Jack Davis in architecture, Richard Sorensen in business, and James I. Robertson Jr. in history. The value-priced tours are led by professional tour planners. Review the list in the following pages, and don't miss an opportunity to travel with fellow Hokies.



Vice President for Alumni Relations



or 2011, we're rolling out a series of weekend programs exclusively for alumni and their families. The series will feature fun and interesting topics—fine dining, photography, environmental sustainability, the arts, science exploration, and Blacksburg's annual Steppin' Out summer festivalpaired with specially discounted accommodations at the Inn at Virginia Tech.

### Food for thought: Entertaining with fine wine and creative cuisine

### Feb. 18-20, 2011

Join us for an elegant and informative weekend of wine and fine cuisine. Learn about the wine industry, tourism, and production. Stroll through our food stations, where hospitality and tourism management students prepare foods matched with just the right wine. We'll top it all off with a special dance demonstration and a night of dancing to live music.

### Focus on photography: Learn from the masters

### March 25-27, 2011

Do you want to take better pictures of your family, friends, and favorite scenes? Are you wondering what kind of camera to purchase to produce better photographs? Are you tired of red-eye and silhouettes produced by traditional flash? If you are looking for the answers to any of these questions, this seminar is for you. Learn everything you need to know about photography from our master photographers.

### Sustainability in gardening, crops, urban forestry, livestock, and food safety June 16-19, 2011

Join faculty as they share their expertise in sustainability efforts on campus and around the commonwealth. The weekend will feature faculty from the College of Agriculture and Life Sciences, the College of Natural Resources and Environment, and the Virginia-Maryland Regional College of Veterinary Medicine (VM-RCVM). Faculty presentations and tours of Kentland Farm, the Hahn Horticulture Garden, and the Catawba Sustainability Center will allow participants to witness sustainability efforts in action.

### Off-off-Broadway: A behind-the-scenes look at theater arts

#### July 1-3, 2011

Come back to campus this summer and experience the arts at Virginia Tech. This family-friendly experience will give par-

ticipants the opportunity to meet talented faculty and students and learn about the new and exciting things happening in the School of Performing Arts and Cinema. Experience theater design firsthand by attending a theatrical production and taking a backstage tour. Live, learn, and love the arts at Virginia Tech!

### Steppin' Out at Summer Around the Drillfield

#### Aug. 4-7, 2011

The always-popular Summer Around the Drillfield is a chance for alumni, family, and friends to visit Virginia Tech for a closer look at research and student life and to experience some of the New River Valley's outdoor attractions, including Blacksburg's Steppin' Out festival. Enjoy the offerings from more than 185 artists and crafts people, featuring handcrafted items, artisan foods, and three stages of live performances. This year's program also features presentations of observational astrophysics at the Martin Observatory, tours of VMRCVM, and a visit to historic Mountain Lake. Come enjoy Virginia Tech at the Summer Around the Drillfield's 21st annual celebration!

For more information, go to www. alumni.vt.edu/drillfieldseries or call 540/231-6285.

### **SPECIAL ALUMNI PRICING!** The Inn at Virginia Tech \$99 per night\* \*Based on availability.

### **Alumni program tailored** to enhance careers

Program offers guidance for work-life changes and opportunities

The Virginia Tech Alumni Association recently unveiled a program to assist Hokies seeking employment or considering a job change. The program identifies resources that offer assistance, ideas, advice, or facts for alumni. Visit the website at www.alumni.vt.edu/career.



### Finding a job or changing jobs

Many alumni are experiencing new challenges in their careers. Some are losing their jobs due to the economy, some are venturing into new careers by choice, and others are dealing with downsizing within their own companies. Whether you're tweaking a résumé, searching for interview tips, or reviewing a job board exclusively for Hokies, the alumni career resources site can be a valuable tool.

### Career advice

Assessing personal skills, talents, and interests in order to determine potential career options is a strategic step toward making a change. Webinars will be available on the site to help alumni review and evaluate possibilities. Discussions and seminars on topics ranging from entrepreneurship to business trends will be included.

### Resource library

Additional resources on the website will address every aspect of a career change. Virginia Tech Career Services offers assistance to students and recent graduates and provides links to resources for experienced alumni.

### You can help!

We invite all Hokies to help enhance this service for alumni by completing the following steps:

- Post job openings to the Hokie Nation Network (HNN) at www. alumni.vt.edu/hnn. Any company employee who is a Hokie can post an opening for free. Postings can also be sent to Nancy Brittle, director of the alumni career resources program, at nbrittle@vt.edu.
- Edit your individual profile on HNN to indicate your willingness to talk to other Hokies about your industry or company. Social networking is a key method of identifying job opportunities.
- Contact Brittle to share seminars or relevant information that might be useful to other Hokies who are experiencing career changes.
- Retired alumni living in the Blacksburg area can join a program called Virginia Tech Experts in Action, a team of professionals who give back to the university by sharing their time, talents, and experiences with students and faculty.



For more information, contact Nancy Brittle at 540/231-8901 or nbrittle@vt.edu.

erving more than 200,000 alumni, the Virginia Tech Alumni
Association supports more than 120 active alumni chapters
throughout the United States and abroad. Chapters sponsor a
variety of programs, including socials, academic speaker events, careernetworking opportunities, and community service projects. This past
year, chapters provided \$185,000 in scholarships to students from their
regions attending Virginia Tech. The following are but a few examples of
the outstanding programming offered to the Hokie Nation.



### Hokie Day at the Stock Show and Rodeo San Antonio Chapter

The San Antonio Chapter gathered for Hokie Day at the Stock Show and Rodeo, the city's largest annual event. Hokies gathered on the fairgrounds for a BBQ dinner, livestock exposition, marketplace, and carnival. The San Antonio rodeo is the second-largest rodeo in the nation. The chapter raised money for their scholarship fund and plans to make the event an annual tradition. Guest Tom Tillar could not attend due to snow.

### Business Alliance Chicago Chapter

The Chicago Chapter's Business Alliance provides opportunities for alumni to gather, hear from a prominent speaker, and learn about a topic important to the business community. Topics have included "An Evening of Fine Wines and Hokies" with Pamplin College of Business Professor Rick Perdue, and "Hokie Speed Networking" to share business and contact information.

### Hokies Helping Hokies Richmond Chapter

Now in its third year, Hokies Helping Hokies is a networking forum that brings together employment-seeking alumni and business representatives in the Richmond area. The chapter hosts monthly meetings at the Richmond Graduate Center over coffee and pastries, with time set aside for participants to share résumé information and their career goals. Business representatives have occasion to advertise their businesses and job openings within their companies.

### Wine Tasting and Silent Auction Denver Chapter

Annually, the Denver Chapter holds its Wine Tasting and Silent Auction event. A different wine theme is selected each year, ranging from wines around the world to specialty themes such as wines from Italy or Colorado's Western Slope. Donated by chapter alumni, silent auction items raise money for scholarships to benefit incoming freshmen from the Denver area. The chapter awards an average of \$5,000 each year in scholarships.



### Saratoga Races New York Capital District Chapter

Alumni and friends gathered at the Saratoga Race Course in Saratoga Springs, N.Y., for a day of racing. Tom (business administration '63) and Bonner Young, thoroughbred breeders and owners, joined the group to discuss the day's racing. Jack Hutcheson, director of Capital Region alumni programs, obtained paddock passes for participants to see the horses up close.





### Feast on the 50 Central Florida Chapter

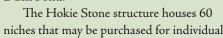
The Central Florida Chapter participated in Feast on the 50, a contest sponsored by Florida Citrus Sports to determine the best local alumni chapter. The event is regularly held in the fall to entice local alumni chapters to tailgate at the Citrus Bowl. Alumni from Big Ten, SEC, ACC, and Big East schools participated.



### Columbarium completed on campus

Many campuses have a columbarium where alumni and others from

an extended university family may choose to be interred. An attractive columbarium has been constructed on the grounds adjacent to Virginia Tech's Holtzman Alumni Center, on a grassy knoll with a picturesque view of the Duck Pond.



or dual interments. Each niche is covered with a maroon granite face, on which names will be engraved and filled with gold lettering. Behind the columbarium, there is a walkway leading to a terrace area. Beyond its current capacity, the area is designed to accommodate expansion, with future walls bordering the terrace. For more information on the Virginia Tech columbarium, contact Josh Burnheimer at 540/231-6285 or fburnie@vt.edu.

The first interment was held on Veterans Day and honored Brett Blackwell (business administration '63), a member of the corps of cadets and Highty-Tighties who served in the U.S. Army Signal Corps following graduation and wished to be buried at his alma mater.

### 2010-11 Board of Directors

Curry A. Roberts '80, president Lance L. Smith '68, president-elect Matthew M. Winston Jr. '90, vice president Tom Tillar '69, secretary/treasurer Kevin W. Leclaire '95, past president

### DIRECTORS

William A. Aden '67, '72 Ryan M. Beach '97 Mary Jones Berry '62\* Daniel W. Bird Jr. '60\* Jeanne C. DaDamio '75, '76 Kendley J. Davenport '84 Lisa Carter Ellison '86 Douglas R. Fahl '65 A. Jerome Fowlkes '88 Kathleen Kyger Frazier '04 Harry N. Gustin II '43\* Todd F. Hearp '89 William B. Holtzman '59\* Gene A. James '53\* Hoda Kotb '86 William C. Latham '55\* Mark S. Lawrence '80

W. Park Lemmond '54

R. Easton Loving '89, '91 Aaron McClung '00 Pamela A. McConnell '72 Kylene Barker McNeill '78 Gregory D. Merritt '93 Lisa Glasscock Miller '87 Nicholas J. Moga '76 Jean Skelton Montague '69 Brian C. Montgomery '03 Thomas W. Moss Jr. '50\* James P. O'Connell '97 Jay S. Poole '78 A. Carole Pratt '72 Glenn P. Reynolds '76 Philip S. Thompson '77 G.T. Ward '49, '52\*

\*Lifetime honorary member

#### **Alumni Association Board of Directors ballot**

The Alumni Association Board of Directors nominating committee has proposed the following nominees for election to three-year terms from 2011 through 2014. Please vote for up to 11 nominees and return the ballot by April 15. Results will be announced at the Alumni Association board meeting in late April.

- William A. Aden '67, '72
  Blacksburg, Va., civil engineering
  and sanitary engineering
- Morgan E. Blackwood '02

  Midlothian, Va., industrial systems
  and engineering
- Marvin J. Boyd '00
  Ashburn, Va., management science
- O Todd F. Hearp '89 Salem, Va., finance
- Pamela A. McConnell '72
  Hixson, Tenn., horticulture
- Kylene Barker McNeill '78 Naples, Fla., clothing and textiles
- O Gregory D. Merritt '93
  Sterling, Va., marketing management
- Glenn P. Reynolds '76
  Blacksburg, Va., architecture
- Karen E. Torgersen '78, '86
  Raleigh, N.C., elementary education and M.B.A.
- Jim L. Wade '76
  Roanoke, Va., accounting
- Oakton, Va., history

Write-in nomination

Signature

Return to: Virginia Tech Alumni Association Holtzman Alumni Center (0102) Blacksburg, VA 24061

#### www.vtmagazine.vt.edu

### Hokie Gold legacy program

Wanting to honor their 50th anniversary reunion and create a lasting legacy, Jess Fowler (general science '64), along with other Class of 1964 M Company members of the corps of cadets, proposed a special program that is designed to pass on the spirit of Virginia Tech through the university's cherished class ring tradition.

The program enables alumni and families to donate their class rings to be melted down to create Hokie Gold, which would then be included in the gold for the class rings of the next junior class. Other universities, including the U.S. Military Academy at West Point and the U.S. Naval Academy at Annapolis, have such programs in place.

The Class of 1964 will launch the inaugural Hokie Gold program in spring 2012. The rings will be melted at the new Virginia Tech Foundry Institute for Research and Education

Class of 2011 students with President Charles W. Steger and Janet Steger

(VT FIRE) on campus.
The resulting ingot, or
"billet," will then be
refined at the Balfour
manufacturing plant
in Austin, Texas, and
processed into tiny pellets
so that a small amount can
be included in all Class of
2014 gold rings.

In addition, a portion of the gold will be saved for inclusion in the following year's program.

Thereafter, a new group of rings donated by December will be melted down and made

into Hokie Gold for inclusion in rings for the next junior class. For each year of Hokie Gold, biographical information about the donated rings' owners will be compiled.

Six members of the Class of 1964 have already committed to donate their class rings to Hokie Gold. It is Fowler's wish that the program continue in perpetuity to extend the heritage of Hokie Gold into the rings worn by future Hokies.

For more information, visit www.alumni.vt.edu/hokiegold/.

Class of 2011 centennial ring class gift unveiled and dedicated In celebration of 100 years of the class ring tradition, President Charles W. Steger and Janet Steger joined the Class of 2011 leadership team to unveil and dedicate the class gift. The class commissioned a large bronze Centennial Ring, which is displayed in the atrium of Squires Student Center. The Stegers served as the namesakes for the Class of 2011 ring collection, celebrated at the Ring Dance in March 2010.

# Belize: The Trans Habitat Experience

### Jungle Lodge Tour with Wildlife Excursions | 7-Night All-Inclusive Land Package | April 2–9

- Journey into the foot hills of the Maya Mountains in our Land Rovers. Visit traditional Mayan Villages and several nearby archaeological sites.
- Take a caving expedition into Blue Creek Cave and swim at its cool mouth of crystal clear waters.
- Visit the Boden Creek Wildlife & Reintroduction Center where two primate and several bird species are part of a rescue.
- Enjoy kayaking and canoeing on Golden Stream, jungle hikes on local trails, and our canopy tree platform.
- Take an electric pontoon boat safari with our expert naturalist guides. Search for howler monkeys in the canopy, watch for tapir and wild pig on the riverbank.
- From the Moho Cay enjoy half- and full-day snorkeling, swimming, and sea kayaking adventures.

### For more details or to register: www.alumni.vt.edu/travel/belize

### Stay in all three lodges!







oho Cay Lodge



Indian Creek Lodge



### Connect, Network, Get Hired

Hokie Nation Network (HNN) is a free online social and professional networking site designed to connect Hokies around the globe.

### Why YOU Should Join the Hokie Nation Network:

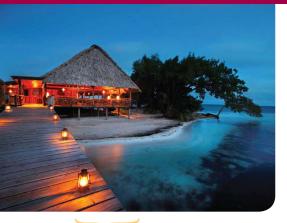
- Connect with friends, classmates, alumni, students, faculty, and staff
- Career opportunities: post your resume, create new business contacts, start a discussion related to your field, or find employment apportunities.
- Learn current Virginia Tech information on colleges, departments, student groups, and more
- Mentor students and young alumni to share your experiences and career field
- Advertise special opportunities to other Hokes such as: house for rent, employment availabilities, Virginia Tech sporting tickets, and more.

### **Quick Steps to Register:**

- 1. Go to www.alumni.vt.edu/hnn
- 2. Login with your VT PID and Password
- 3. For help obtaining a VT PID or Password, visit www.alumni.vt.edu/VTID
- 4. Create your profile and start networking!

For more information, please contact
Gwen Harrington, Assistant Director for Alumni Relations,
at vtalumnet@vt.edu.

### Virginia Tech alumni travel the world



**Belize Jungle Lodge Tour with Wildlife Excursions** April 2-9 | \$2,999\*

**Jewels of the Mediterranean** and Greek Isles April 12-23 | \$3,499\*

(air included)

Hosted by Alumni Distinguished Professor James I. Robertson Jr. and Betty Lee

**Hokies at the Kentucky Derby** May 5-8 \$1859\*



**Sketches of Spain** May 5-16 | \$3,495\*

**Treasures of China and Tibet -Century Sky** May 20-June 4 | \$4,095\*

**Essential Europe Grad Trip** May 21-June 14 | \$4,095\*

**Baltic Treasures -**Copenhagen to Stockholm June 10-21 | \$3,699\*

(air included)

**Amalfi - The Divine Coast of Italy** June 15-23 | \$2,795\*

Hosted by Richard Sorensen, dean of the Pamplin College of Business

Vikings, Kings, and Castles: England, Scotland, Norway, Ireland, the Isle of Man, and Wales July 14-29 | \$5,299\* (air included)



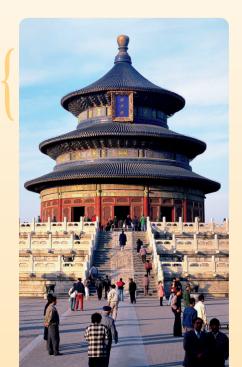
**Alaskan Adventures** Aug. 4-14 | starting at \$2,999\* (air included)

**Grand Journey Around the World** Sept. 3-28 | \$29,995\*

Chicago - An Insider's Perspective Sept. 6-11 | \$1,995\*

Hosted by Jack Davis, dean of the College of Architecture and Urban Studies

**Grand Danube Passage Cruise -Amadeus Elegant** Sept. 13-27 | starting at \$3,895\*



France - Paris and the Villages and Vineyards Oct. 6-16 | \$3,295\*

**Treasures of East Africa** Oct. 21-Nov. 3 | \$5,495\*

**Mexican Riviera Cruise - Symphony** Nov. 27-Dec. 4 | starting at \$3,795\* (air included)



\*Prices may vary per person and are based on double occupancy. Airfare and V.A.T. taxes are not included, unless otherwise noted. Special airfare is available from most major cities. Dates and prices are subject to change.

To learn more about alumni travel tours or to request a brochure, visit www.alumni.vt.edu/ travel. If you have any questions, please contact Gwen Harrington, alumni travel coordinator, at 540/231-6285 or alumnitravel@vt.edu.

#### Alumni travel insurance

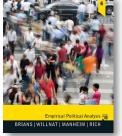
The Virginia Tech Alumni Association strongly recommends that travelers purchase insurance when traveling internationally. An alumni tour is a major investment. Travel insurance will protect that investment. To learn more or to purchase insurance, go to www.alumni.vt.edu/ travel/insurance.

Virginia Tech Magazine is pleased to note books by alumni, faculty, and staff or books about Virginia Tech. To submit a book, please mail it to Book Notes, Virginia Tech Magazine, 105 Media Building, Blacksburg, VA 24061 You can also e-mail a high-resolution image of the book cover, along with your name, the name of the publisher, and a brief description of the book, to vtmag@vt.edu. For more information about Book Notes policies, please go to www.vtmagazine. vt.edu/bookreview.html.

### Books by faculty

In Empirical Political Analysis, by Associate Professor and Associate Chair in

the Department of Political Science Craig Leonard Brians and Professor Richard C. Rich, director of the Center of Environment and Energy Studies, et al., the authors



provide a comprehensive survey of designing experiments, conducting research, evaluating results, and presenting findings. The publisher is Longman Publishing (1185 Avenue of the Americas, New York, NY 10036); www.pearsonlongman.com.

In An Illustrated Guide to Relativity,

Tatsu Takeuchi, associate professor in the Department of Physics, explains Einstein's theory of relativity by using "spacetime diagrams," instead of equations, progressing from basic to advanced

Relativity

topics in a manner that is informative to

scientists and accessible to non-scientists. The publisher is Cambridge University Press (32 Avenue of the Americas, New York, NY 10013); www.cambridge.org/us.

### Books by alumni

The Last Jew of Rotterdam, by Ernest Cassutto (D.V.M.'89), is a true story of

triumph in World War II. The author tells the story of his parents' struggle to survive the Holocaust and find faith in the most trying of times. The publisher is Purple Pomegranate Productions (60

Haight St., San Francisco, CA 94102); http://store.jewsforjesus.org.

High Tech Terror: Recognition, Management, and Prevention of Bio-

logical, Chemical, and Nuclear Injuries Secondary to Acts of Terrorism, by Robert Samuel Cromartie III and Richard Joseph Duma (general science '55), educates health care profes-

sionals about the issues in the title. The publisher is Charles C Thomas (2600 S. First St., Springfield, IL 62794); www. ccthomas.com.

The Cordial Cricket, by Elizabeth Howard (management science '98), is a

The

Cordial

Cricket

children's book about a young cricket that learns, while planning his birthday party, what it means to be cordial. Howard's 7-year-old son illustrated the cover. The book is self-published

by The Cordial Cricket (3524 Festival Park Plaza, Chester, VA 23831); www. thecordialcricket.com.

Designing Online Learning with Flash,

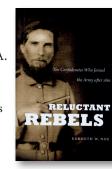
by David Richard Moore (agriculture and applied economics'91, curriculum and instruction M.A.Ed. '93, Ph.D.'95), is a step-by-step guide to developing Flash



tutorials for instructional purposes. The publisher is Pfeiffer (989 Market St., San Francisco, CA 94103); www.pfeiffer.com.

Reluctant Rebels: The Confederates

who Joined the Army after 1861, by Kenneth W. Noe (history M.A. '81), contextualizes the stories of individual soldiers who experience optimism and then defeat in the Confederate war



effort. The publisher is University of North Carolina Press (116 S. Boundary St., Chapel Hill, NC 27514); http:// uncpress.unc.edu.

The Italian Stiletto, by Ralph Riffenburgh (biochemistry '43), is a novel about a brilliant, attractive serial killer, her background, and the police department's search for her. The book is



self-published through Publish America (Box 151, Frederick, MD 21705); www. Publish America.com.

Alumni, we want to hear what you've been doing. Although we cannot print stories or obituaries, we can post online photographs of weddings, babies, and spirited alumni. Mail photos to Virginia Tech Magazine, 105 Media Building, Blacksburg, VA 24061, or e-mail them to vtmag@vt.edu. Please mail career, retirement, wedding, birth, and death notices to Alumni Notes, Virginia Tech Alumni Association, Holtzman Alumni Center, Blacksburg, VA 24061; send them via e-mail to fleets@vt.edu: or submit them online at www. vtmagazine.vt.edu/submit.classnotes.html.

Editor's note: For privacy reasons, mailing addresses for alumni appearing in Career News, Weddings, and Births and Adoptions, may now be viewed online only at www.alumni.vt.edu/directory by logging in with your Virginia Tech PID and password



'44

Mitchel Raftelis (BAD '47), Quantico, Va., served the town as a councilman from 1967-98 and again from 2006-10, as mayor from 1998 to 2006, and as trea surer/clerk from 1958-80.

Paul A. Tanner Jr. (BIOL), Winter Haven, Fla., has authored an autobiography entitled My Whole Life and Family Medical Practice.

'61

Thomas V. Warren (BAD), Crewe, Va., retired as circuit judge after 32 years of

'62

James T. Roberts Jr. (BAD) Savannah, Ga., was selected as the Hokie Hero for the Virginia Tech vs. Boston College game.

'64

Edwin R. Cowherd (FW), Union Point, Ga., is 2010 president of the Surveying and Mapping Society of Georgia.

Leigh M. Vaughan (SOC), Cary, N.C., retired from Talecris Biotherapeutics Inc.

**Lucy Minogue Rowland** (BIOL, MICR), Athens, Ga., retired from the University of Georgia and was awarded the title of professor

emerita. William H. van der Schalie

the Andy Swiger Land-Grant Award and was conferred the title of W.G. Wysor Professor Emeritus of Crop and Environmental Sciences by the Virginia Tech Board of

Blacksburg, Va., received

Douglas W. Anderson

(FIN), Hanscom AFB, Mass. received his second Legion of Merit award and retired from the U.S. Air Force with 30 years of service.

Virginia Bruce Combs (EDPE, HPE), Lutherville,

Md., retired after 25 years of service with the Baltimore County Fire Department as a firefighter, paramedic, and fire apparatus driver/

Michael R. Kansler (MF). Raleigh, N.C., received the Utility Leadership Award and the American Nuclear Society Meritorious Performance in Operations Award.

Mark J. Shuart (ESM, ESM), Hampton, Va., retired from the NASA Langley Research Center after 32 years of service and joined the Virginia Tech Department of Materials Science and

Ellen Barnard Vance (SOC), Richmond, Va., is vice president and chief human resources officer for Shelter ing Arms Hospital.

77

Victor S. Lyons (EDSS), Elkin, N.C., wrote a chapter in a popular philosophy series entitled Christmas-Philosophy for Everyone: Better Than a Lump of Coal.

Paul S. Muller (CE, CE), Ashland, Va., was re-elected president of Muller Engineering Associates P.C.

(ZOOL), Point of Rocks, Md., received the 2010 Service to America Medal.

Marcus Alley (AGRN, AGRN), Saifur Rahman (EE), McLean, Va., was ap-

pointed the Joseph R. Loring Professor of Electrical and Computer Engineering by the Virginia Tech Board of

Janine Snead Hiller (HIST), Blacksburg, Va., received a Fulbright Scholar grant and is the Fulbright-Lund Distinguished Chair of Inter national Public Law.

'80

Patricia Martin Dove (AGRN, GEOL), Blacksburg, Va., was appointed the C.I "Sally" Miles Professor of Science by the Virginia Tech

Board of Visitors.

Richard D. Nehring (LAR, ARCH), South Ogden, Utah, received the U.S. Air Force 2010 Design Excellence Award in the civilian cat-

Suzanne Beamer Bohnert (COMM), Arlington, Va., received the Mom's Choice Award for the Most Outstanding Nonfiction Children's Book.

Truman A. Capone (EDVT), Blacksburg, Va., was conferred the title of professor emeritus by the Virginia Tech Board of Visitors.

Mary Kathryn Burkey Owens (ENGL), Chesterfield, Va., was listed in "Top 25 Female Super Lawvers" in the 2010 edition of Virginia Super Lawyers.

Stephen R. Davis (PSCI), Virginia Beach, Va., was recognized as a "Top 50" lawver in the 2010 edition of Virginia Super Lawvers

David L. Comey (MKTG), Chesapeake, Va., is president of Southeastern Insurance Services.

'86

Charles A. Kilpatrick (CE). Fredericksburg, Va., is chief deputy commissioner of the Virginia Department of Transportation.

Laura Hartigan Lukas (HNF), Naperville, III., was accepted into the prestigious Albert Einstein Distin guished Educator Fellowship

Jeffrey D. Zelman (MKTG), Leesburg, Va., is vice president and corporate controller of Feld Entertain-

Michael G. Baum (PHED. EDPE), Midlothian, Va., is executive director of Keep Virginia Beautiful Inc.

Steven A. Carter (HIST), Fairfax, Va., was selected as the Hokie Hero for the Virginia Tech vs. James Madison University game.

Ray A. Mottley (CE), Newport News, Va., retired from the U.S. Air Force after more than 20 years of service.

Jeffrev K. Woods (MKTG). New Freedom, Pa., was selected as the Hokie Hero for the Virginia Tech vs. Boise State University game.

Tracy Tate O'Dowd (ELED), Frederick, Md., served as the Frederick County campaign director for Bob Ehrlich's campaign for governor of Maryland.

Matthew M. Winston Jr. (MKTG), Athens, Ga., was elected to the Council for Advancement and Support of Education Board of Trustees.

Erik W. Fox (FW), Win-

arborist certification from the International Society of

Chervi Stanley Grant (PSCI). Pfafftown, N.C., is a group benefit specialist in new business development for

Kevin R. Mitchell (ARCH, ARCH), Gaithersburg, Md., is a licensed architect for the state of Maryland.

Michael R. Murphy Jr. (BIOL), Mechanicsville, Va., was awarded a fellowship in the Academy of General Dentistry.

Scott L. Van Voorhees (ARCH), Williamsburg, Va. is serving on the James City County Parks and Recreation Advisory Commission

**Shannon Dooley Chance** (ARCH), Hampton, Va., received an Outstanding Dissertation Award from the International Society of Educational Planners and is an associate professor of architecture at Hampton

Judith M. Lynch (EDSP, ELPS), Christiansburg, Va. was named to the Longwood University Board of Visitors by Gov. Bob McDonnell.

Suhail S. Khan (PSYC). Lititz, Pa., received accreditation as a Leadership in Energy and Environmenta Design Green Associate from the U.S. Green Building Certification Institute

Philip D. Schroeder (CSES, CSES), Athens, Ga., is an associate professor in the agriculture and veterinary technology department at Alfred State College.

Heather J. Durkin (COMM). Fairfax, Va., created an international research network, "Help A Librarian, which has become a trusted source for information professionals worldwide.

Roanoke, Va., is the marketing and brand manager for NetVentures Corp.

David F. Sadlier (PSYC), Fredericksburg, Va., was selected as the Hokie Hero for the Virginia Tech vs. East Carolina University game.

Anthony L. Ciuca (PSCI), Souderton, Pa., is an associate for the business services department with Schnader Harrison Segal & Lewis LLP.

John M. Ennis (CE), Lex-

ington Park, Md., received

the Marine Corps Aviation

Pilot of the Year Award.

Association John Glenn Test

**Elizabeth Johnson Howard** (MSCI), Chester, Va., earned the ICON Honors Innovation Award for using technology to increase sales for her business, The Cordial

**Christopher D. Schooley** (LAR), Greenville, Va., is manager of Gay and Neel

'99

Roger A. Craig Jr. (BIOL BIOC), Newark, Del., appeared on "Jeopardy!" in September and set a record for one-day total earnings.

Jeffrey S. Crouse (MUS). Carv. N.C., made a Christmas CD, Little Town: Carols for Christmas, which features acoustic jazz and vocals.

'00s

'02

L.P. Foshee (BAD), Mandeville, La., started his own company, East-West Designs, representing manufacturers of furniture and furnishings focusing on the hospitality and commercial industries.

Sandra L. Dika (EDRE), Charlotte, N.C., is an assistant professor of education research at the University of North Carolina at Charlotte

Michael D. Killi (FIN), Coral Springs, Fla., started his own technical company, TekPro Staffing LLC.

Chi-Ying S. Lu (ISE), Emeryville, Calif., started a company, ecoVegan, which promotes healthy, nutritious, and convenient plant-based lifestyles.

Jennifer A. Nelson (COMM),

John R. Weeks (ME), Floyd, Va., is an account executive with Hobbs & Associates.

Ashlev A. White (MUS. MSE), Newport News, Va. is the 2010-11 MRS/OSA Congressional Science and Engineering Fellow.

Damon J. Claus (COMM), Allison Park, Pa., is a sales executive for Thorley Industries, doing business as 4moms, which develops products for the juvenile industry using innovative technology and robotics.

Alana M. Manzini (IDS), Kailua, Hawaii, is the associate art director for Hawaii Business Magazine.

Brian A. Peters (HIST), Chattanooga, Tenn., completed his master of education at the College of William and Mary and is now a resident director at the University of Tennessee at Chattanooga.

George Parker III (ELPS), Virginia Beach, Va., is principal of Green Run High School, which was awarded the College Board's Inspiration Award.

### Weddings

'83 Alisa Burns Dear and David M. Dear, Bihor, Romania, 5/22/10.

'91 Julie Benton Olson and Paul R. Olson, Chesapeake, Va., 1/9/10.

'94 Brian N. Cunningham and Monica A. Neshat, Great Falls, Va., 11/14/09.

'00 Heather Buteux Lee

and Sean P. Lee, Washing

tonville, N.Y., 7/2/10. '00 Bonnie Williams DeMay and '02 Christopher DeMay, Chantilly, Va.

'00 Jeannette Crispin Sanders and Tim Sanders, Fredericksburg, Va., 6/20/10.

'01 Michael J. Nelson and

Alumna receives governor's award for service

BY CHAD O'KANE M.A. '11

Helen He (M.S. natural resources '04) is undeniably committed to the Virginia Tech motto, Ut Prosim (That I May Serve). Involved in community service for more than 16 years, He received the Maryland Governor's Volunteer Service Award in April 2010 for her tireless dedication to volunteer work with the Chinese community.

After completing an undergraduate program in civil engineering in China. He moved with her husband



Helen He '04

to the United States and spent the next 10 years raising two sons. She also began to devote herself to volunteer work, supporting and promoting a variety of projects and events, including Community Service Day and Asian-Pacific American Heritage Month, as well as clothing and food drives for low-income families.

During her time as a Virginia Tech student, He began to expand her service repertoire beyond the Asian-American community. "As I went through the program at Virginia Tech, I began to realize that service is so important, not just to one country or one community of people, but to the entire world," she said. "For teaching me that lesson, I love Virginia Tech—and I love giving back to the community."

He brings that same spirit and enthusiasm to her current position as a program specialist with the College of Natural Resources and Environment at the Virginia Tech Northern Virginia Center in Falls Church, Va., where she has helped to expand the relatively young graduate program.

In addition to her role with Tech, He remains committed to community service as president of the Coordinating Council of Chinese-American Associations in Washington, D.C. She was an advocate for the 2010 Census, connecting census staff with Chinese communities to encourage stronger participation. From 2003-07, she served on the board of directors for the International Fund for China's Environment. In short, He has left a trail of service, from China to Tech to D.C.

Chad O'Kane (M.A. communication '11) is a graduate assistant with Virginia Tech Magazine.

Jennifer L. Butcher, Springfield, III., 8/7/10.

'01 Heather Grice Nelson and Andy Nelson, Washing ton, Pa., 7/4/10.

'01 Jacqueline Merrill Schools and '02 Jason T. Schools. Mechanicsville Va., 6/12/10.

'02 Lauren Duvall Heisey Arlington, Va., 6/12/10.

'04 Alexander S. Beck and '04 Karen Amores, Arlington, Va., 8/16/10.

'04 Jason P. Henrich and Gendriel L. Gullickson, Appleton, Wis., 5/15/10.

Fort Mill, S.C., 5/15/10. '04 Ashley L. Smith and '05 Kristen D. Gates, Charlotte,

N.C., 10/09.

'05 Bethany Hamilton Tate and Michael Tate, Gate City, Va., 7/10/10. '05 Milagros Perez

Tenga and '06 Ryan R.

Tenga, Christiansburg, Va., '04 Crystal Smith Rollins and '05 Henry S. Rollins, '06 Lindsey Leisher Estes and Nicholas Estes, Arling-

ton, Va., 9/26/09. '06 Erin Burress Hillenbrand and Karl D

www.vtmagazine.vt.edu

'75

### 50 years of space exploration

BY CHAD O'KANE M.A. '11

Looking at Edward M. "Mack" Henderson's long and distinguished career in space exploration, it's natural to wonder if there's any aspect of National Aeronautics and Space Administration (NASA) history in which he hasn't played a role. Henderson (aerospace engineering '65), who recently received the U.S. government's 50-year service award, was involved in some of the earliest NASA projects.

Originally from Salem,



Edward M. "Mack" Henderson '65

Va., Henderson received a naval scholarship but was unhappy with the lack of aeronautical engineering courses at the school he chose to attend. He reached out to his uncle, a math professor at Virginia Tech, who recommended the university's co-op program in aerospace engineering. Henderson eagerly joined.

Henderson's first co-op position with the space program was in Alabama, where he worked on rocket-guided missiles for the U.S. Army. Following graduation, he joined the newly developed Manned Spacecraft Center in Houston and, during his tenure there, worked in a variety of capacities for the Gemini, Apollo, and space shuttle programs.

Henderson credits much of his personal success to the cooperative education he received at Virginia Tech. "I can't say enough about the preparation I received at Virginia Tech," he said. He also pointed out that Tech graduates have been instrumental in the growth of the world's No. 1 space program. The "Hokie Nation is very well represented," he said. [Go to www.vtmagazine.vt.edu to see a summer 2003 story on NASA's Hokies.]

Recently, Henderson helped set up the transition team charged with safely retiring the space shuttle. While he believes the commercialization of spaceflight has great potential, he is sad to see the shuttle program end. He said he fears that a gap in viable U.S. spaceflight that could have dire consequences for the nation's educational system.

"The space program inspires young people to get interested in technology," Henderson said, "and inspires them to go to universities such as Virginia Tech that are committed to harnessing that enthusiasm and educating the best and the brightest minds to lead us into the future."

Chad O'Kane (M.A. communication '11) is a graduate assistant with Virginia Tech Magazine.

Hillenbrand, Richmond, Va., 6/26/10.

'06 Heather Hewitt Lockridge and Christopher M. Lockridge, Winchester, Va.,

'06 Nicholas A. Melnyk and Amber L. Lemmon, Davidson, N.C., 8/8/10.

'06 Thomas B. Ross and Nicole Dodge, Centreville, Va., 7/3/10.

'07 Laura Harris Brumsey and Jamey L. Brumsey, Bealeton, Va., 5/15/10.

'07 Ashlev Doolev Carpenter and Trey Carpenter, Belmont, N.C., 4/24/10.

'07 George F. Eichinger III and '07 Lindsey N. Wood, Somerville, Mass., 4/10/10,

'07 Kathryn Lord Ferro and Mark A. Ferro, Monrovia, Md. 8/14/10

'07 Alice Duncan Ignaszewski and '07 Dan Ignaszewski, Rockville, Md.,

'07 Amanda Cronin Rumore and '08 Michael A. Rumore, Lynchburg, Va., 10/17/09.

'08 Cory A. Brammer and '08 Ashley A. Colbassani, Fairfax, Va., 5/22/10.

'08 Stacey Corwin Farrelly and '08 Stephen Farrelly, San Francisco, Calif. 8/14/10

'08 Thomas K. Rosen and '09 Jessica B. Daniels Norfolk, Va., 6/26/10.

'08 Dawn Becker Spitzer and '08 Jason Spitzer. Hagerstown, Md., 5/30/10.

'09 Joseph M. Daniele and '10 Grace A. Williams, Enid,

'09 Travis L. Rookstool and Meagan L. Funk, Blacksburg, Va., 7/10/10.

### Births and adoptions

'89 Erin Walker Webster, Tega Cay, S.C., boy and girl, 5/12/10.

'91 David A. Jones, New York, N.Y., boy and girl, 3/31/10.

'92 John N. Barrett and '94 Nancy Gilmore Barrett, Pulaski, Va., a son, 6/7/10.

'92 Kenneth H. Foster, Midlothian, Va., a daughter 3/2/10.

'92 Rex E. Morris, Springfield, Va., a daughter,

'92 Melissa Simmons Virginia Beach, Va., a son,

'94 Gregory S. Fowler, Fairfax. Va., a son, 6/21/10.

'95 Nathan A. Curtis and '96 Tina Brockelsby Curtis Fairfax, Va., a son, 7/7/10.

'95 Keli Faria Fisher and '95 Shane A. Fisher, Manassas, Va., a daughter, 5/31/10.

'95 Stephen Q. Hole, New York, N.Y., a daughter, 7/8/10.

'95 Paul A. Joyner and '98 Elisa Montano Joyner, Ster ling. Va., a son. 5/4/10.

'95 Laura A. Lew and '97 Christopher S. Kehde, Oak Hill, Va., a daughter, 6/12/10.

'95 David T. Polk, Arlington, Va., a son, 7/14/10.

'96 Mark D. Piechoski Christiansburg, Va., a daughter. 7/29/10.

'97 Eric M. Brittle, Wakefield, Va., a son, 8/8/10.

'97 Brian W. Casto and '98 Carrie Willems Casto, Ellicott City, Md., a daughter,

'98 James W. Barnes, Creedmoor, N.C., a son, 4/27/10.

'98 Raymond E. Clarke IV and '99 lennifer Reedy Clarke, Huntersville, N.C., a daughter, 6/30/10.

'98 Barbara Kolacki Ressler, Maple Park, III., twin boys, 8/10/10.

'99 Heather Shifflett Hogge, Hayes, Va., a daugh ter, 9/23/10.

'00 Rebecca Johnson Baunsgard, Bothell, Wash. a son, 8/15/10.

'00 Jill Infante Newman and '01 Jeffrey O. Newman, Roanoke, Va., a son, 6/10/10.

'00 Jeannette Leftwich O'Neill and '01 Mike P. O'Neill. Roanoke, Va., twin girls, 8/14/10.

'01 Giles A. Gray and '02 Kerri Carico Gray, Bluff City, Tenn., a daughter, 3/8/10.

'01 Jonathan H. Rau. Chesapeake, Va., a son, 6/18/10. '01 Jacqueline Wormsley

Ryan and '03 Steven P.

Rvan. Bristow. Va., a daugh

and '03 Hunter B. Sexton

ter. 9/14/09. '02 Beverly Kain Sexton Clayton, N.C., a daughter, 6/18/10.

'03 Ann Marie Ferramosca Coolick, Arlington, Va., a son. 11/5/09

'03 Dustin L. Grissom and '04 Kathy Despain Grissom Sahuarita, Ariz., a son, 6/13/10.

'04 Amanda Walton Mc-Creary and '06 Benjamin F. McCreary, Roanoke, Va., a

'04 Courtney Semach Zimmerman, Creedmoor, N.C., twin boys, 2/5/10.

'05 Ross G. Hewitt II and '07 Jodie Hamrock Hewitt Winchester, Va., a daughter, 9/7/10.

'05 Eason A. Park and '05 Erin Wilson Park, Suffolk Va., a son, 5/6/10.

### **J**eaths

'34 Edward K. Jones. 7/17/10 (153 Oriole Ave., Princeton, WV 24740).

'38 Ralph E. Buckley,

'38 Bergen F. Berkaw. 7/31/10 (950 Travelers Blvd., Apt. D4, Summerville, SC 29485).

7/17/10 (3919 Keith Pl. Annandale, VA 22003) '39 Milton Irizarry, 5/23/10

(23 Calle Jose Julian Acosta San German, PR 00683). '40 Jack S. Slusser, 8/2/10

(200 Lake St., Apt. 303A. Dallas, PA 18612). '40 John G. Sowder. 8/23/10 (P.O. Box 159,

Providence Forge, VA

23140).

'40 John G. Webb Jr., 4/22/10 (Alexian Village 100 James Blvd., Apt. N 204, Signal Mountain, TN

'41 Harry C. Stewart Jr., 8/17/10 (103 Lee Burke Rd., No. E14, Front Royal, VA

'41 Robert J. Watson, 7/1/10 (Apt. 234, The Jefferson, 900 N. Taylor St. Arlington, VA 22203).

'41 Robert L. Woodbury, 7/9/10 (73 Brook St., West wood, MA 02090).

'43 Thomas I. Parks Jr., 8/27/10 (Apt. 1407, 600 Carolina Village Rd., Hende sonville, NC 28792).

'44 George A. Gehrken. 8/11/10 (26085 Rochelle St., Courtland, VA 23837).

'45 Parker D. Archibald, 8/17/10 (1600 Westbrook Ave., Apt. 526, Richmond. VA 23227).

'45 Edward F. Rowe. 7/8/10 (4675 Long Leaf Dr., Winston-Salem, NC 27101).

'46 H. Bill Butler Jr., 6/28/10 (1431 Ramseur Ln., Winchester, VA 22601).

'46 Eleanor Thomas Hamilton, 6/27/10 (435 Old Mill Rd., Glade Spring, VA 24340).

'46 Preston R. Ogle, 8/4/10 (2165 Galleon Dr., Apt. G4, Vero Beach, FL

'46 Randolph W. Smith 8/23/10 (Cottage 6, 4312 S. 31st St., Temple, TX

'46 Edward B. Sparks, 7/20/10 (P.O. Box 406, Orange, VA 22960).

'48 Roy H. Bible Jr., 4/19/10 (Apt. 405, 1900 Ballington Blvd. N.W., Roch ester, MN 55901).

'49 C. Philip Machen Jr., 8/7/10 (3100 Shore Dr... Apt. 341, Virginia Beach, VA 23451).

'49 Howard B. Watkins. 8/28/10 (317 Kent Rd., Charlottesville, VA 22903)

'50 A.S. Cannon Jr., 8/8/10 (7124 Patriots Colony Dr. iamsburg, VA 23188).

'50 George L. Fox Jr., 7/9/10 (1603 Front St., Columbus, TX 78934).

'50 Robert T. Slater 7/6/10 (6600 Lincoln Hills Ct., Frisco, TX 75034). '50 John C. Smith Jr.,

speare St., Lake Oswego, OR '50 Gregory L. Smith Jr., 7/30/10 (15954 Cala Rojo Dr., Colorado Springs, CO

6/22/10 (6330 S.W. Shake-

'50 William A. Tyler Jr., 8/3/10 (P.O. Box 339, Waverly, VA 23890).

'51 Wayland D. Andrews, 7/13/10 (311 Tarrytown Dr., Richmond, VA 23229).

'51 Jesse A. Crews, 8/8/10 (9222 Shannon Rd., Me. chanicsville, VA 23116).

'51 William H. Johnson 7/3/10 (10468 Bracket Ford Cir., Manassas, VA 20110).

'51 Howard W. Muir Sr. 6/20/10 (103 Melrose Pl.. Martinsville, VA 24112).

'51 Joseph E. Russo,

### **Alumnus changes the way we "Google"**

BY HILLARY MAY '12

The Internet just became a little more instantaneous. To bring users the live results of Google Instant, Manas Tungare (Ph.D. computer science '09) worked for more than a year developing prototypes and performing experiments. Not only was he a member of the Search User Interfaces team, but he was also the first engineer on the Google Instant project.



Manas Tungare '09

The Google Blog describes Google Instant as a search that "takes what you have typed already, predicts the most likely completion, and streams results in real time for those predictions."

"Being able to take an idea and build a prototype is one of the key skills that the real world finds valuable, and my experience at Virginia Tech directly helped me with that goal," Tungare said. He explained that working with his advisor, computer science Associate Professor Manuel Pérez-Quiñones, helped reinforce his decision to work in industry because of the combination of real-world scenarios and research angles.

Tungare interned at Google for several years while at Tech before joining the company professionally. He praised his coworkers' creativity and the sense of teamwork. "It's fun getting up in the morning and looking forward to cooking up new user-interface ideas," he said.

His personal website, http://manas.tungare.name, represents the creativity he brings to his field. It showcases a variety of software projects he has developed on the side—from a handy script that allows users to add discussion forums on their websites to a program that indicates if a phone number spells a recognizable word.

The before-you-type search completion may seem like the fastest a search can be, but Tungare and his team are still developing new ideas after Instant's Sept. 8, 2010, launch. Although he cannot discuss what they are working on, he notes that the team regularly comes up with new ideas to benefit users. "I look forward to being part of the next big thing,"

Hillary May (English '12) is an intern with Virginia Tech Magazine.

8/20/10 (410 Bobby Jones Dr., Portsmouth, VA 23701).

'51 Carter L. Smith, 8/6/10 (895 Old Dam Neck Rd. Virginia Beach, VA 23454).

> '51 Harry M. Sweet, 8/20/10 (Apt. 509, 1001 Mar Walt Dr., Fort Waltor Beach, FL 32547)

'52 Don P. Fankhauser 8/14/10 (2204 Skimmer Ct., Murrells Inlet, SC 29576).

'52 Felix E. Obenshain Jr. 8/19/10 (129 Centers Ferry Rd., Harriman, TN 37748).

'52 James F. Payne 6/24/10 (11079 N. Halifax Rd., Stony Creek, VA 23882)

'53 Earle L. Kirkley Jr., 8/5/10 (2330 Huron Tr. Maitland, FL 32751).

'53 Harry H. Price Jr., 7/31/10 (P.O. Box 242, Emory, VA 24327).

**'54 H.V. Ewell Jr.**, 6/26/10 (15589 Big Rd., Bloxom, VA

'54 Lee C. Hartman Jr. 7/29/10 (1896 Tinker Top Rd., Daleville, VA 24083).

> '55 Frank J. Boyce. 6/12/10 (279 Woodberry Rd. S.W., Meadows Of Dan, VA 24120).

'55 Harry F. Zahn III, Manteo, NC 27954).

'56 Robert D. Helms, 8/10/10 (749 Jackson St., Woodstock, VA 22664).

'**56 George W. King**, 6/30/10 (P.O. Box 306, Shawsville, VA 24162).

'58 D. Richard Crafton, 6/30/10 (7354 Fontana Ridge Ln., Raleigh, NC 27613).

'58 Ned G. Kirby, 8/12/10 (7009 Cedar Bend Ct., Raleigh, NC 27612).

'59 James W. Murray, 7/26/10 (16008 Quarters Ln., Haymarket, VA 20169)

'59 Leo D. Staton, 6/28/10 (115 John Pott Dr., Williamsburg, VA 23188).

'60 Ronald M. Warren, 6/22/10 (102 Richardson Blvd., Lugoff, SC 29078).

'61 Robert I. Morrison, 6/2/10 (200 Gribbel Rd., Wyncote. PA 19095).

'61 Frank E. Roberson, 6/17/10 (206 Oakmount Dr., Peachtree City, GA 30269).

'62 A.W. Gauldin, 7/1/10 (623 Gum Branch Rd., Charlotte, NC 28214).

'62 Lee G. Goss, 7/29/10 (Apt. 4, 3354 Glade Creek Blvd. N.E., Roanoke, VA 24012).

'62 D.S. Henshaw, 8/5/10 (140 Country Place Ct., Columbia, SC 29212).

'62 Robert K. Kennedy, 8/18/10 (115 Bexley Dr., Lynchburg, VA 24502).

'63 Paul A. Calhoun Sr., 6/25/10 (1606 Teal Marsh Rd., Charleston, SC 29412).

**'64 Floyd I. Aylor**, 8/7/10 (32880 S.W. Bell Rd., Sherwood, OR 97140).

'66 Frank W. Adkisson, 8/18/10 (108 Weir Point Dr., Manteo, NC 27954).

'69 Roy E. Clark Jr., 6/13/10 (4164 S 36th St., Arlington, VA 22206).

'69 Michael S. Sherman, 8/16/10 (14020 Welland Terr., North Potomac, MD 20878).

'71 David A. Graham, 8/19/10 (6069 Highland Rd., Dublin, VA 24084).

'71 Allen J. Newberry II, 6/22/10 (2746 Gardner Dr., Salem. VA 24153).

'71 Margaret Ray Pillar, 7/10/10 (2855 Rogers Dr., Falls Church, VA 22042).

'73 Vander M. Nester, 7/2/10 (508 Mongoose Junction, St. John, VI

'74 Charles A. Lytton, 6/20/10 (13610 Hailsham Cir., Midlothian, VA 23113).

**'74 Ernestine B. Roller**, 7/12/10 (3622 Keagy Rd., Roanoke, VA 24018).

'74 Douglas W. Shrader Jr., 7/20/10 (41 West End Ave., Oneonta, NY 13820).

'77 Robert W. Gray III, 8/8/10 (P.O. Box 96, Eleanor, WV 25070).

'77 Richard G. Lang, 6/26/10 (2345 Longfellow Rd., Carlsbad, CA 92008).

'77 Warren T. Parker, 8/25/10 (245 Fairway Dr., Asheville, NC 28805).

'**78 Michael K. Long**, 6/19/10 (10416 Stonehill Dr., Benbrook, TX 76126).

**'79 David L. Parrish**, 7/23/10 (1685 Cartersville Rd., Mineral, VA 23117).

'79 Carlos P. Surratt,

6/21/10 (General Delivery, Toast, NC 27049).

'81 Randy L. Cates, 6/18/10 (P.O. Box 100012, Palm Bay, FL 32910).

**'82 F. David Feng**, 8/1/10 (11527 Buckhaven Ln., West Palm Beach, FL 33412).

'82 Charles E. Thorpe III, 6/23/10 (950 Amy Ridge Ct., Kissimmee, FL 34747).

'83 Roger D. Class, 7/3/10 (3 Partridge Dr., Blairstown, NJ 07825).

'83 Orrin E. Taulbee II, 8/26/10 (813 Sovereign Way, Redwood City, CA 94065).

'85 Robert A. Schmitz, 7/26/10 (19208 Wind Dancer St., Lutz, FL 33558).

**'86 Mark D. White**, 8/22/10 (1406 Ashford Ct., Blacksburg, VA 24060).

'87 Amy E. Bloxom, 6/27/10 (9517 Groundhog Dr., Richmond, VA 23235).

'87 David W. Ribar, 7/9/10 (320 English Oaks Cir., Boerne, TX 78006).

'88 Larry D. Sumner, 7/21/10 (P.O. Box 7685, Fredericksburg, VA 22404).

'90 Charlotte E. Yager, 7/8/10 (208 Hampton Ct., Blacksburg, VA 24060).

'92 Scott P. Heckel, 7/12/10 (517 Berry St., Stoughton, WI 53589).

'95 Brian J. Minchin, 7/6/10 (1413 Washington Dr., Stafford, VA 22554).

'96 Jinghong Kang (3708

Valley Oaks Dr., Fairfax, VA 22033).

'98 Jennifer M. Kean, 8/10/10 (623 Old Huntsville Rd., Fayetteville, TN 37334).

'99 Christopher P. Cimon, 7/22/10 (14307 Old Courthouse Way, Newport News, VA 23602).

**'01 Oana Popescu**, 6/21/10 (General Delivery, Blacksburg, VA 24060).

'02 Richard D. Scholz, 7/17/10 (314 Ford St. S.E., Albuquerque, NM 87123).

### Student deaths

David Campbell Gayle (Class of 2012), 9/25/10 (7439 Flicker Pt., Norfolk, VA 23505).

Faculty/staff obits

Clifton Dow Bryant, professor emeritus of sociology in the College of Liberal Arts and Human Sciences, died Sept. 13, 2010. Bryant came to Virginia Tech in 1972 as chair of the Department of Sociology, where he remained until he retired in 2007. He received six teaching awards and his college's Excellence in Research and Creative Scholarshin Award

David E. Hutchins, professor emeritus in the School of Education in the College of Liberal Arts and Human Sciences, died Nov. 6, 2010. The award-winning professor taught in the counselor education program for 31 years and was one of two full-time professors who started graduate programs in counselor education and college student affairs.

Thomas Sitz, associate professor emeritus of biochemistry in the College of Agriculture and Life Sciences at Virginia Tech. died Sept. 28, 2010. A faculty member since 1982, Sitz taught biochemistry in a rig orous manner that stressed fundamental principles and foundational skills. As an undergraduate recruiter, he was instrumental in advancing the quantity and quality of students pursuing bachelor of science degrees in biochemistry.

### Alumni obits

Owen B. Pickett, 80, a Tech graduate who served in the U.S. House of Representatives from 1987 to 2001, died Oct. 27, 2010. Born in Richmond, Va., Pickett graduated from Henry Clay High School in Ashland, Va., in 1947. He earned his bachelor's degree in business administration in 1952. As an undergraduate, he was a member of the corps of cadets and the business fraternity Alpha Kappa Psi.

He practiced law in Richmond until moving to Virginia Beach in 1965 and becoming active in politics. In November 1971, he was elected to the Virginia House of Delegates, where he served until 1986. In 1986 Pickett was elected to represent Virginia's 2nd Congressional District in the U.S. House of Representatives, going on to earn re-election six times before retiring in 2001. In 1993, Pickett was honored with the Virginia Tech University Distinguished Achievement Award.





**Hokie Business Showcase** - Advertise your business in Class Notes! Contact us at vtmag@vt.edu for rates and more information. Restricted to alumni-owned businesses.

# GEAR UP FOR VT BASKETBALL WITH NIKE APPAREL!



NIKE KNOW YOUR TEAM WOMEN'S TEE



NIKE CLASSIC COLLEGE HOODIE



NIKE WASHED WAFFLE LONG SLEEVE TEE



NIKE THERMAL LONG SLEEVE TEE

Powered By Neehn



NIKE WOMEN'S TWO-IN-ONE SHIRT



CHECK OUT OUR FULL SELECTION



OF HOKIE GEAR AND MERCHANDISE FOR THE WHOLE FAMILY!

NIKE REPLICA BASKETBALL JERSEY

118 SOUTH MAIN | TECHBOOKSTORE.COM



At Virginia Tech, a leading academic and research university, we are committed to helping the commonwealth maintain economic strength and stability. By serving as a statewide resource for the advancement of industry, we use our expertise and contacts to build a workforce equipped to face the challenges of the future. Take for example the Virginia forest industries, a \$27 billion sector in the commonwealth. Together with the Southern Virginia Higher Education Center, Danville Community College, Halifax County Public Schools, and WoodLINKS USA, we're motivating and preparing high school students to study advanced wood manufacturing upon graduation. The result is a win-win situation. Students become proficient in a high-demand field and manufacturers have an exceptional talent pool from which to hire and therefore remain competitive. VirginiaTech
Invent the Future®

To learn more, visit www.vt.edu/impact.