Want your own piece of Beamer’s legend?

For this month’s Relay for Life raffle fundraiser, the ISE ambassadors are pleased to be raffling off a football signed by Frank Beamer, Bud Foster, and Logan Thomas.

Frank Beamer is currently the winningest active coach and longest tenured coach in Division I FBS. He began his career in high school by earning eleven varsity letters. He then moved on to become the starting Hokie cornerback for three years in Blacksburg.

One of the most renowned defensive coordinators, Bud Foster, is currently in his 26th season with Virginia Tech. He embodies the motto W-I-N (What’s Important Now) in his current defense strategy as well as in his “Lunch Pail Defense” scholarship fund.

All proceeds from the raffle will be donated to the American Cancer Society, through Virginia Tech which currently holds the title for the largest collegiate Relay for Life in the world.

To purchase raffle tickets please contact the Relay for Life committee head, Katie Antonacci, at katiea33@vt.edu.

Tickets are 1 for $4 and 3 for $10. The drawing will be held February 1, 2013 at 5:00 PM.

Welcome Paula Van Curen

by Joyce Vest

The Grado Department of Industrial and Systems Engineering would like to welcome Ms. Paula Van Curen to the ISE Department. Paula is an Academic Advisor, working with Joyce Vest and Dr. Eileen Van Aken to support the undergraduate program. She will also support the Northern Virginia graduate programs and advise students in our off-campus programs. Lastly, Paula will also help us expand our international programs and activities through study abroad experiences and internships.

Paula moved to Blacksburg in 1990 after an enlistment in the U.S. Air Force and has been at Virginia Tech since 1992. She received a B.A. in Interdisciplinary Studies with minors in Psychology and Sociology in December 1998 and her M.A.Ed. in May 2001 from Virginia Tech. She has held positions in the Registrar’s Office, the Pamplin College of Business Undergraduate Programs, the Dean of Students, and most recently, the Bradley Department of Electrical & Computer Engineering, before beginning her position here in ISE on November 1, 2012.

Paula and Sam, her husband of 22 years, actively participate in local organizations, such as Animal Hope Alliance and the Virginia Tech Campus Police Support Group, and spend time caring for numerous foster, stray and their own cats. We are very excited to have Paula with us in ISE.
Ways to Stay Connected
If you and members of your class or your employer would like to sponsor or be a co-sponsor of an event (e.g. ISEats, pizza for information sessions, Relay for Life fundraising events, etc.), contact us and we will coordinate your efforts!

Featured Article

Engaged Student: Manasi Mehta

Engineering and the Corps of Cadets are both programs for which Virginia Tech receives national recognition. Senior ISE student Manasi Mehta of Manassas Park, Va. was persuaded to apply to the university because of each, but she has found plenty of ways to distinguish herself through other academic and personal pursuits.

While the first few weeks were tough, Mehta is thankful she became a cadet. “One of the main reasons I signed up is because in order to understand leadership, you really have to do it hands-on. You can’t just learn it sitting in class and taking notes.” Mehta has gone on to serve in leadership and mentorship roles within the corps. “I really learned how to motivate people—how when you commit to something, not to give up. I had a freshman lose about 40 pounds because that was a goal of his. I learned to gain inspiration from it.”

She encourages others to join the Corps, both for their success in school and beyond. “Leadership in the Corps wants to make you a good citizen, not just of the United States, but of the world. The commandants want you to be a good person mentally, physically, and spiritually.”

Mehta has also gained valuable experience doing undergraduate research. This past summer, she assisted a doctoral student in measuring the movements and fatigue of construction workers. Last year, she worked in a robotics lab, where she had to program a robotic hand to draw a straight line. It took days of frustrating work to complete. “I could have just drawn the line myself,” Mehta said. “I figured out that it was not really about drawing the straight line. It was getting the concept down so I could build off of it.”

Undergraduate research has given Mehta a new perspective on her education. “Research is more about the journey, not the destination. You make mistakes and it’s okay. Failing is not a bad thing when you do research.”

Along with engineering, Mehta is pursuing minors in industrial design, green engineering, business, and leadership. Each broadens her research interests and career options, including a new role as project manager for the Office of Energy and Sustainability’s greenhouse gas inventory assessment project on campus. She expects to utilize her academic studies and leadership skills in the position. “When you are in the Corps and tell a freshman to be somewhere at a certain time, they have to be there. Now I am transitioning to my peers. I am going to be learning a lot about how to lead your peers or even those above you or who know more than you.”

Beyond academics and the Corps, Mehta—a global ambassador through the Cranwell International Center, mentoring international students. “Sometimes I will stop by just to see if any students speak Hindi and want to talk to someone else who speaks the language. It helps them feel at home.”

Mehta also loves to share her culture through dance. She is a well-trained classical Indian dancer, an art she has practiced since she was a little girl. “I got my love of dance from my mom. When I was little and would get upset, she would dance for me. It stuck with me.” Mehta had the opportunity to share her gift with a performance at the Kennedy Center in high school and in the Governor’s School for Dance. She hopes to perform on campus during her senior year.

As a way to combine all of her scholarly and personal interests, Mehta wants to join the Peace Corps after she gains U.S. citizenship. But she is not burdening herself too much with the future. “God is really big in my life. I let him handle my future decisions. I know whatever happens is going to be best for me.”

Article adapted from the original publication by author Alison Matthiessen
2nd Annual ISE International Night
By Ali Reedy

Marian Alejandro Begazo Quiroga and Marines Tarabillo present on Bolivia

The ISE Ambassadors hosted the second annual ISE International Night on October 23rd. Students and exchange faculty presented on the countries of Bolivia, Brazil, Chile, France, Germany, Mexico, Saudi Arabia, Thailand, and the United States.

Those in attendance learned about the history, geography, and culture of each country. Some highlights of the event included learning about the Yungas Road carved into a mountain in Bolivia, the different regions of Brazil including Rio de Janeiro, the sight of the 2016 Summer Olympics, and the best place to get Thai food in Blacksburg. International students and faculty were also encouraged to bring food native to their country. Attendees dined on Bolivian chicken wings, Brazilian sweets and a few other treats from the countries represented.

Special thanks to the College of Engineering for providing food for the event.

Don’t miss out on the 3rd annual ISE International Night next fall!

IIE Hosts Six Sigma Yellow Belt Certification
By Kaitlyn Stelmack

The Virginia Tech chapter of Institute of Industrial Engineers hosted their first ever Six Sigma certification on November 10th. Sixty participants attended the Yellow Belt certification that was offered to all ISE students at a discounted price. The course lasted about eight hours and was taught by an IIE Six Sigma trainer. Over the past year, the IIE national chapter has been working with the university chapters to make Six Sigma certification available to students. The Yellow belt course provided a management overview of the concepts, structure, and organization of Six Sigma. The seminar also provided the students with a general understanding of the topics of variation, process capability, and root cause analysis. The participants gained background knowledge and were able to tie in many IE topics taught in their courses. Moving forward, IIE plans to sponsor more training courses and work towards offering the industry-recognized Green Belt certification.

Taking the Reins by Harold Kurstedt and Tim Thayne

Leadership, Supervision, & Management Lessons from a Horse

“Kurstedt and Thayne have done two things better than most and have added an unusual parallel to the process of leading: the training of a horse. Within the text they attempt to answer the question, “What can the cowboy-and-horse partnership teach us about the fundamentals of leadership, supervision and management?” The answer is plenty!” -from the testimonial of Dr. Paul Torgersen

Author Harold Kurstedt recently retired from Virginia Tech as the Hal G. Prillaman Professor Emeritus of Industrial and Systems Engineering. For more information, or to order a signed copy of the book, visit http://takingthereinsbook.com
Advisory Board Q&A

By Sarah Oertel

On behalf of the ISE Ambassadors and the students in the department of Industrial & Systems Engineering, I’d like to thank the members of our advisory board for participating in the question and answer session on Thursday, October 18th.

Nine members of the advisory board attended the evening event and answered questions ranging from graduate school advice to techniques for becoming a successful business leader. Each member of the board had a different story to tell, but all members stressed the importance of working diligently, building a support network, and being willing to try non-traditional roles that open up with an ISE degree.

A peek inside the Advisory Board’s bookshelf:

The Corner Office
By Adam Bryant

The Back of the Napkin
By Dan Roam

Drive
By Daniel Pink

The Art of Possibility
By Benjamin Zander

The Invisible Touch
By Harry Beckwith

Who Moved my Cheese?
By Spencer Johnson

Word Search: ISE Technical Electives

Y M S G L I L H B W G C D F P C C P W B S H G Q Z
B T J G P Z P U R F T W X H P A V A B M C K H Q
O Z E Q L Q J V I Z Q E T K L U U B I E E O P A U
J F E F Q U A L I T Y C O N T R O L N L T S H D R
N O I T A Z I N A G R O F O Y R O E H T S T L B L
N W D K K S E B K E P N M W O M I D K Y Y C P L C
L A O N H W L Q Y R F A D R T G H D M E S O V M U
K W E R M U A R H T V X X Y E V A M T T N G L K
U D W L K D A E N I K P R H Y H R M R S N T V C U
A F H M D P J H O O C R L Z J P H E A H E R N Q G
Y T R F Z G H N Q Z I A Y V N P L L W O M O Y B X
E F A X P T K Y S C I T S I G O L Z S N E L V U R
C E R G U C G W S R G F A V N D Y L H H G N Y Q X
Y J O Y S P K C T I K G I P R Q W X Y F A U O R B
A K Z U C P L S W V Q V C U X E C F F N M T V Z
R A O J Y A U K Z E L L F U C Y O R V A T X W A
D X I M L D E I G E I E O D F A C U I Y M O N M P

Word Bank

Automation   Industrial Hygiene   Management Systems   Theory of Organization
Cost Control   Lean   Logistics   Occupational Safety   Work Physiology   Quality Control
Senior Design: Engineers go Abroad

by Marcus Privitt

Seniors in Industrial & Systems Engineering are required to take ISE 4005: Project Management and System Design. According to the class description, ISE 4005 is a capstone design sequence allowing students to work in teams to develop a proposal and implement an industrial engineering design project for real-world clients. This real-world application sets ISE apart from other departments at Virginia Tech.

What’s not included in the 2012 description, however, is the opportunity for four teams to work cooperatively with French engineering students to solve a problem of a French client.

Virginia Tech and École des Mines de Nantes, a French Engineering university in Nantes, France, have established an exchange partnership allowing the two universities to annually alternate sending students to the other university. During the one-week experience, the students become acquainted with their cross-cultural team members, meet with clients, and begin initial work on the project. After the week is over, students return to their respective countries and work on the projects throughout the semester via video conferencing and other internet collaboration tools.

This year, four teams of Virginia Tech ISE students traveled to France to meet and collaborate with their partner teams of École des Mines students. During the week, teams further researched their problems, met with clients, and worked to develop project proposals to submit to clients. The proposals were presented to Virginia Tech and École des Mines professors and department heads.

As with any cross-cultural experience, substantial learning comes when one steps out of the classroom. In addition to working with language and cultural differences, teams realized the sharp contrast of working styles and how the style integrates in the social world.

As part of the concluding presentations, teams shared general observations of the cultural differences seen throughout the week. American students noticed that French students were generally better brainstormers and planners who began each meeting with a process map to ensure thoughts and responsive actions were well-organized. French students observed that Americans were generally less-focused on “thinking” and more focused on “doing.” The working style of Americans is more trial-and-error, and if the idea did not work out, Americans went back to the drawing board. The two styles often clashed, but their combination proved to be invaluable in productivity and overall strength of each team’s project.

Having the opportunity to work cross-culturally is an experience that has permanently affected all those who were involved. American students thank École des Mines de Nantes professors Dr. Yeung, Dr. Lemonie, and Dr. Castanier, and Virginia Tech professors Dr. Taylor, Dr. Nachlas, and Dr. Agnew. The students also wish to thank the ISE department for having the vision to establish such a partnership. Lastly, the Americans thank all French students who worked to introduce them to their culture and ultimately exposed them to another way of life.
Creating a Culture of Giving

At the Grado Department of Industrial and Systems Engineering, our vision is to be leaders in research, education, professional outreach and leaders in our communities and society. Funds from the Commonwealth of Virginia to Virginia Tech do not cover our annual budget or needs. Private giving is critical if we are to maintain, let alone improve, the high quality of our processes. Giving to ISE at Virginia Tech can provide student scholarships, maximize students’ learning, help us attract and retain the world’s best faculty, assist with day-to-day operations, and help maintain state-of-the-art research and teaching facilities. If we are to be competitive with other top 10 departments, giving is vital.

To aid us in soliciting funds for this endowment, we recently commissioned a sculpture, which has been installed on the wall in Durham Hall right outside the departmental main office. The names of our benefactors appear prominently on the large brass plaques above the sculpture and the names of our Patrons appear on the brass plaques on either side of the sculpture. Our Sponsors names appear on the bronze plaques surrounding the sculpture.

Our Most Vital Need - The Excellence Fund

A Special Thanks And Recognition To Our Excellence Fund Contributors

Adams, Michael & Brenda
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Leslie, Charles
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Montgomery, Doug & Cheryl
Norris, Jack
O’Brien, Charley & Betsy
Overby, Tom & Carolyn
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Szabos, Brian & Kurstein
Taylor, Bob & Connie
Taylor, Don & Jo Ellen
Torgersen, Paul & Dot
Van Aken, Eileen & Steve
van Luyn, Dutch & Trudy
Worley, Hal & Thornie
WE WOULD LOVE TO HEAR FROM YOU!

Companies Hiring Hokies
In our upcoming issues we will be featuring a “Companies Hiring Hokies” section! If you would like to nominate your employer for this section, please send the name of the company and a short description (including what ISEs do at the company) by email to Joyce Vest at vestjs@vt.edu. A group picture of the Hokies working at the company would be great, too! Please be sure to include all relevant information including your name, address, phone number, and email address and names of the ISEs in the group.

Celebrate with ISE
Please send in any updates and announcements such as (but not limited to) marriage, births, career accomplishments, retirement, community projects, and awards and recognitions by email to Joyce Vest at vestjs@vt.edu or by mail to the Department, address listed below. Please be sure to include all relevant information including your name, address, phone number, and email address.

Address Updates
Mailing and email address updates should also be sent in to Joyce Vest at vestjs@vt.edu.

Comments or Suggestions
Contact Chief Editor Ali Reedy at ali90@vt.edu

Congratulations 2012 Fall APM Initiates!

Solution to Word Search on Page 4

Grado Department of Industrial and Systems Engineering, Virginia Tech
250 Durham Hall, Blacksburg, VA 24061
phone: (540) 231-6656, fax: (540) 231-3322, email: ise@vt.edu