A Message from the Department Head

As we start another academic year, I would like to take a moment to say how proud I am of the Grado Department of Industrial and Systems Engineering. At all levels, including undergraduate students, graduate students, faculty, staff, and alumni, we are working together to achieve excellence in all aspects of departmental life. It seems that I say this each year, but I firmly believe that the year that we have just completed is the best one that we’ve ever had relative to almost any of the metrics that we track.

We remain a solid Top 10 ISE program in the United States, and we have had unprecedented growth in our student population. Even as we grow, the quality of our incoming students is the highest in departmental history. It is getting harder and harder to gain admission to our department, so those of you who have made it should be very proud of your achievement.

Our distinguished, diverse and growing faculty and staff have also been leaders in their professions. We continue to enjoy strong teaching performance, increased success in research and publications, and excellent service to the university and the community. You will see three new faces in the faculty ranks this year (Joe Gabbard, James Kong, and Navid Ghafrarzadegan), and we are currently advertising for four additional faculty members! Our alumni continue to make us proud as well, with diverse and significant achievements being reported almost daily.

I continue to believe that our success as a department has no bounds. I anticipate that each person in the ISE family will continue to strive, to improve, and to achieve during the coming year, and I expect that next year I will once again be able to say that we just finished our best year ever. I wish each of you a fantastic year!

Don Taylor

Hot Off The Press: Our Seventh Edition

Dear ISE Graduates, students, and fans,

Welcome to the seventh edition of The ISE Connection! The ISE department is stronger, and larger, than ever before, and this newsletter will be packed with information covering everything from new faculty to IIE Conference information, as well as other events that take place in the months to come. Also of note is our newly launched website for students, www.vtise.org.

Inside this edition, you will find information about the great things done last semester including high school recruiting efforts, community service projects with an ISE flair, and a recap of awards and honors from Senior Symposium as well as Outstanding Senior and leadership awards.

The goal of this newsletter is to keep you up to date with the doings of the department. If you have any questions, comments, or information you would like included, please contact Joyce Vest at vestjs@vt.edu and let us know. We value your feedback! Happy reading!

Your ISE Editors
Featured Article

ISE Ambassadors start high school recruiting

After several years of recruiting ISE students at majors fairs and Engineering Information sessions, it has become clear that most entering freshmen do not know what Industrial and Systems Engineering is. This places the department at a disadvantage because it must first teach students what ISE is and then sing its praises. In order to solve this problem, ISE Ambassadors Marielyn Hagy and Jared Meyers launched a high school recruiting initiative over last winter break.

Though this program was created by the ISE Ambassadors, it was open to all ISE students who wished to participate. The student recruiters were given a PowerPoint geared towards high school students as well as an outline of potential talking points. Students also had to attend a training session to brush up on presentation skills and to have the chance to ask the Ambassadors any questions.

Over winter break 2012, ISE students went to their local high schools and began giving the 15-20 minute presentations. The presentations began with an introduction to Virginia Tech followed by a brief summary of general engineering and then a more substantial section explaining ISE. After the students had a working knowledge of ISE, several slides detailed the opportunities at VT such as the hands-on senior design projects, business and green engineering minors, and internship and co-op information.

The high school recruitment program reached over 800 high school students across several states and was an overall success. Amy Pulling Martin of Thomas Dale High School said, “[Sarah Oertel] … really caught the attention of my students. I can say that they definitely learned something that day. I was especially interested, as I am an Industrial Engineering major from Clemson University.”

This year, Ambassadors hope to continue the program and reach an even wider range of students.
Community Service using ISE knowledge

One of the key things employers like to see on potential employees’ resumes is job experience. Some students do not have that critical internship or co-op, so the ISE Ambassador Community Involvement Committee has supplied students with ways to give back to the Blacksburg community while applying ISE skills.

The most recent project completed by ISE students was a project for the YMCA at Virginia Tech called Ytoss. This project is the largest student-run sustainability initiative at Virginia Tech. During student move-out, items that would have otherwise been discarded like desk hutches and futons were collected around campus. These items were sold during student move-in, and the revenue collected funds YMCA student programs. Our group was responsible for the logistics of the project and ensured that everything ran smoothly.

Our logistics team designed the floor layout for the sale facility, allowing for optimal placement of sale items. We supplied each volunteer with a facility map so they would know the layout and be able to direct customers with ease. This increased the quality of our customer service. For items that were too large for customers to carry back to their dorms or their apartments, Ytoss offered a delivery service for an additional fee. In the past, Ytoss struggled with maximizing the number of possible deliveries and had to deny some customers’ delivery service because of poor planning. We solved this problem by creating a delivery schedule with the arrival time based on the delivery location. In addition to meeting delivery demands, we were able to accurately estimate delivery time. Our returning customers and sponsors were impressed with our coordination efforts. We increased our gross profit from $10,000 in 2012 to just under $14,000 for 2013.

This year, ISE students plan to continue to use their growing ISE skillset to improve and grow Ytoss.

Written by Meredith Johnson, project head and Outreach chair

Congratulations Mr. and Mrs. Olinger

Featured at left: Ali Reedy (VT ISE Graduate 2013) and Brett Olinger.

Congratulations Mr. and Mrs. Hughes

Featured above from left to right: Amanda Eckenrode, Jessica Seese (VT Civil ’12), Christine Horner (VT Civil ’12), Crystal Wolfgang, Katie Antonacci Hughes (VT ISE ’13), Carly Wolfgang, Kyle Hughes, Logan Hughes (VT Electrical ’11), Trevor Johnson (VT Civil ’12), Joe Antonacci.

Celebrate with ISE!

See page 6 to find out how to be featured in Celebrate ISE
Other Outstanding Awards and Recognitions

Class of 2013 Outstanding Seniors

ISE Advisory Board Leadership Award

Congratulations to our winner, Ali Reedy!

Nominees from left: Kevin Meyer, Colton Wenger, Katie Antonacci, Ali Reedy
Creating a Culture of Giving

At the Grado Department of Industrial and Systems Engineering, our vision is to be leaders in research, education, and professional outreach as well as in our communities and society. Funds from the Commonwealth of Virginia do not cover our annual budget or needs, and 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 office suite. The names of our Benefactors will appear prominently on the large brass plaques above the sculpture and the names of our Patrons will appear on the brass plaques on either side of the sculpture. Our Sponsors’ names will appear on the bronze plaques surrounding the sculpture.

A Special Thanks And Recognition To Our Excellence Fund Contributors

Adams, Michael & Brenda
Adkins, Roger & Mary
Arnold, Dick & Sally
Arnold, Joseph
Askew, Tom
Bailey, Fred
Birk, Lydia
Blackwood, Morgan
Blanchard, Ben & Dot
Brannan, Rory
Burzacchi, Sebastian & Kelly
Canada, John & Wanda
Casali, John
Chachra, Vinod & Ranjana
Cullinane, Thomas & Katherine
Davis, Darrell & Michelle
Deisenroth, Mike & Marilia
Dick, Dan & Lynn
Doughty, Gary & Eleanor
Easterly, Mary Chris
Fitzgerald, William & Vicki
Forbes, Charles & Patricia
Fulton, Steven
Gillespie, Morgan Story
Gingrich, Pete
Grado, John & Corrie
Guynn, Jack & Becky
Harmon, Ken
Hepler, Clint & Nita
Jones, John & Lillian
Klein, Dave & Christine
Laman, Denise
Leclaire, Kevin & Jessica Oi
Leslie, Charles
Mayo, Trevor
McClelland, Robert & Mary
McKnight, John
Memmer, Peter
Miller, Matthew & Holly
Monroe, Ellis
Montague, John & Jean
Montgomery, Doug & Cheryl
Muscatello, Marty & Andrea
Norris, Jack
O’Brien, Charley & Betsy
Overby, Tom & Carolyn
Pannell, Rob
Polk, John & Marty
Porterfield, Robert & Nancy
Powers, Styron
Reynolds III, Edward J.
Ring, Bill & Sara
Rockwell, Chris & Sharon
Rusak, Jennifer & Mark
Sage, Don & Mary Etta
Sauer, Nancy & Ron
Smith, Jaime & Erika
Smith, Michael & Elizabeth
Snelling, Steve
Spitzer, Kirk & Leila
Stewart, Mona & Kevin
Szabos, Brian & Kurstein
Taylor, Bob & Connie
Taylor, Don & Jo Ellen
Torgersen, Paul & Dot
Van Aken, Eileen & Steve
van Luyn, Dutch & Trudy
Waldmiller, Anne
Worley, Hal & Thornie
Coming up this semester:

Outreach within the Blacksburg community that focuses on applying ISE skills learned in the classroom! Potential projects include:

- Ytoss collection plan
- Micah’s Backpack
- Next Door Bake Shop
- Dining Hall consulting
- Lyric Theatre

Have an idea? Let our Community Involvement Committee know by contacting Meredith Johnson at maj1993@vt.edu.

The Relay for Life event itself was muddy and chilly, but the weather did not take away from the spirit among the participants. As in years past, a giant walking track lined with booths and campsites for the various teams encircled the Drillfield. Instead of walking on grass, bridges were formed this year to lead Relay participants over mud and puddles of rain. Hundreds gathered to support the cause, along with about fifteen ISE students representing the team Torgy’s ISE. Students played with Frisbees on the soggy Drillfield and sold Virginia Tech and cancer awareness memorabilia to fund research for a cancer cure. Torgy’s ISE team was supported by over 58 members who worked together to raise over $8000.

We would love to hear from you!

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 at left.

Please be sure to include all relevant information including your name, address, phone number, and email address.

Mailing and email address updates should also be sent in to Joyce Vest at vestjs@vt.edu.
VT IIE Members travel to Regional, National Conferences

Written by Colin Rubright, Senior, Advisory Board and Alumni Relations

Every spring, members of the Institute of Industrial Engineers at Virginia Tech attend the IIE Mid-Atlantic Regional Conference. Schools from across the region that regularly attend include: Tennessee Tech, University of Tennessee – Knoxville, East Carolina University, West Virginia University, North Carolina A&T, Clemson, and North Carolina State University.

This year’s conference was hosted in late February 2013 by West Virginia University in Morgantown, West Virginia. Virginia Tech was represented by a total of twenty-one undergraduate students and three graduate students. The conference included several speakers from the professional sector who were associated with West Virginia University or IIE, a plant tour of Swanson Industries manufacturing plant, a question and answer session with three young West Virginia University alumni, and a keynote speech by our very own Dr. Don Taylor, former national IIE president.

IIE also holds a national conference each May in which professionals and students alike are invited to come and share their work in industrial engineering. This year’s conference was in San Juan, Puerto Rico. Virginia Tech was represented by about fifteen students and several faculty members, including many student and faculty presenters. The conference was a five-day event including presentation, workshops, and tours throughout each day with entertainment and networking opportunities at night.

Next year’s IIE Mid-Atlantic Regional Conference will be this February 21st to 23rd here at Virginia Tech! Look for ways for the student body to get involved in our next edition and coming emails!

VT IIE members at the Mid-Atlantic Regional Conference

Did you know?!
Virginia Tech’s Undergraduate ISE Program was recently named 8th in the nation!

Written by Kenneth Dorsey Jr., Junior, Advisory Board and Alumni Relations

Kollmorgen Hires Hokies!

Left to right: Amber Altice (Quality Engineer), Chris Olsen (Manufacturing Engineer), Josh Bellefeuille (Applications Engineer), Sean Stefaniak (Operations Manager), Eddie Anderson (Advanced Manufacturing Engineering Manager), Andy Hansbrough (Vertical Marketing Manager)

Not pictured: Kevin Layne (Group Executive President) and Steve Van Aken (Global Quality Director)

IIE Students Tour UPS Facility

A Member’s Perspective

On the tour we were introduced to different package sorting strategies, various tracking methods, and innovative features of the Roanoke facility. One of the most valuable assets of the facility was its location adjacent to Roanoke Airport, which allows for speedy transport of deliveries from across the region. Overall, this tour was a great experience and just what I needed to get excited about studying for a STAT 4706 test the following day.

Written by Kenneth Dorsey Jr., Junior, Advisory Board and Alumni Relations

VT IIE members at the Mid-Atlantic Regional Conference

VT IIE Members at the IIE Mid-Atlantic Regional Conference

Kollmorgen Hires Hokies!

Left to right: Amber Altice (Quality Engineer), Chris Olsen (Manufacturing Engineer), Josh Bellefeuille (Applications Engineer), Sean Stefaniak (Operations Manager), Eddie Anderson (Advanced Manufacturing Engineering Manager), Andy Hansbrough (Vertical Marketing Manager)

Not pictured: Kevin Layne (Group Executive President) and Steve Van Aken (Global Quality Director)