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Students "tee up" at Oak Hill

Not many college classes meet beneath a chandelier in an ornate conference room of an exclusive country club. Nor, for that matter, do they typically gather under the sun on the dog-leg right of the 18th fairway. But a dozen RIT students, including three from RIT's American College of Management and Technology in Dubrovnik, Croatia, did just that for what could be called a golf course on a golf course.

This summer, RIT's School of Hospitality and Service Management in the College of Applied Science and Technology offered Golf Course Management. Even more appealing, classes were held *on* a golf course—Oak Hill Country Club in Pittsford, site of this week's 85th PGA Championship.

"That's what makes it exciting," says Rick Lagiewski, visiting professor and course instructor, who created the course with Eric Rule, '81 (food service administration), Oak Hill's general manager.

Classes, featuring grounds and facilities tours and guest speakers from Oak Hill and the PGA, focused on preparations for the tournament—more than two years in the making—including advance marketing, food and beverage catering, greens maintenance, retail merchandise sales, security, site planning, and the role of technology such as global positioning satellites.

"I had no idea all that was involved," says Tom Freer, a fourth-year hotel and resort management major who says taking the course, with its PGA Championship link, was a once-in-a-lifetime opportunity.

"This sector of the hospitality field offers rewarding career opportunities," says Lagiewski, who plans to instruct the course again next summer.

Rick Lagiewski, right, instructs Golf Course Management at Oak Hill Country Club on July 28.

A "challenging course," it included reading and assignments in addition to time on the links. The two-credit-hour course met for three hours a week over five weeks leading up to the start of the tournament.

In addition to those in the class, 55 RIT students are employed in hospitality-related positions for this week's tournament, which features Tiger Woods and other golfers in the spotlight—and RIT students in the know on how it came about. ■

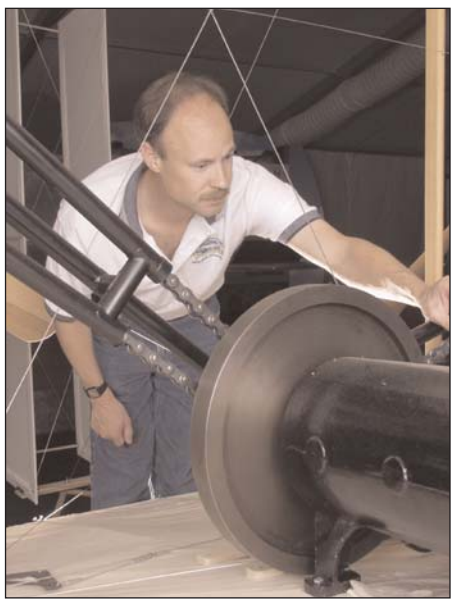
RIT professor to fly replica plane

Kochersberger selected for Wright brothers re-enactment

It's history in the remaking.

Kevin Kochersberger, associate professor of mechanical engineering, is one of only two people selected to fly a reproduction 1903 Wright Flyer later this year to mark the 100th anniversary of powered flight. Kochersberger gained the distinction when he was named a Pilot of the Century by the Experimental Aircraft Association.

First take-off will be at 10:35 a.m. this Dec. 17, the 100th anniversary—to the minute—of the Wright brothers' first powered flight. Re-enactment will take place at Wright Brothers National Memorial, a national park near Kitty Hawk, N.C., and the site of the Wrights' daring experiments. A second re-enactment of the historic flight will be at 2 p.m.



Kevin Kochersberger, one of two people selected as Pilot of the Century, will fly a reproduction 1903 Wright Flyer this Dec. 17 to commemorate the 100th anniversary of the first powered flight. Above, Kochersberger inspects a propeller chain guide on the aircraft. (Photo by Steve Diehl)

The flights by Kochersberger and Terry Queijo, an American Airlines pilot who was part of that airliner's first all-female flight crew in 1986 and who also was named a Pilot of the Century, are the climax to the week-long First Flight Centennial Celebration and the yearlong Countdown to Kitty Hawk, sponsored by the Experimental Aircraft Association and Ford Motor Co.

Kochersberger and Queijo's training, funded by Northrop Grumman Corp., utilizes the reproduction 1903 Wright Flyer, a reproduction 1902 Wright glider and, in a modern concession, a flight simulator developed by Bihrle Applied Research Inc. But it will be a low-tech procedure, a coin toss, that determines who flies on the morning of the anniversary. That flight, five feet above the ground, will cover about 119 feet, a foot less than the Wrights' first flight, Kochersberger says.

"The opportunity to play a key role in the centennial celebration is a great honor, one which will carry over to the RIT community through the classroom and in student advising," Kochersberger says.

A licensed pilot whose first flight was in a hang glider at the age of 15, Kochersberger worked with The Wright Experience, which coordinated research, design and testing of the reproduction Wright Flyer, and on other Wright brothers educational projects over the last five years. On a yearlong sabbatical at NASA's

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CLINTON ON CAMPUS . . . *Sen. Hillary Clinton participated in a round-table discussion on the economic potential of fuel-cell research and development in upstate New York, July 28. The round-table was hosted by RIT and Greater Rochester Enterprise. "The development of fuel-cell technologies holds tremendous promise for the environment and for the economy of upstate New York, where we have a lot of fascinating, cutting-edge work going on with fuel cells, both in private industry and at our academic institutions—like RIT," Clinton said.*

Manning emphasizes using credit wisely

Robert Manning, RIT professor and special assistant to the provost, has designed a financial literacy program to teach first-year college students the ins and outs of credit card debt. It will help prepare students to more effectively manage their money and make smart financial decisions.

"This program will also make RIT graduates more competitive in the job market as employers are increasingly scrutinizing credit scores along with grade point averages," says Manning.

"We have the highest level of student indebtedness in history and the worst job market in a decade," Manning says. "We have more and more students who are dropping out of college for non-academic reasons. Educating students about consumer debt is no longer a luxury."

Manning's financial literacy program will equip first-year students with skills to make financially prudent decisions and minimize their personal debts. His program will debut Aug. 22 as part of RIT's North Star program designed for the incoming freshman class of ALANA students. RIT's First Year Enrichment course during the winter quarter will incorporate two sections of Manning's program into its existing curriculum.

In partnership with RIT, Fisk University in Nashville, Tenn., will also launch a version of Manning's program designed for

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$1.5 million slated for new imaging research

RIT's new Integrated Sensing Systems Initiative stands to receive as much as $1.5 million in federal funding to launch a strategic research program as allocated in the VA/HUD/Independent Agencies Appropriations Subcommittee bill for 2004.

If approved, scientists in the Chester F. Carlson Center for Imaging Science will address the critical national security need for integrated information derived from satellite, ground and airborne sensors. The program will build on the research results from CIS' FIRES program.

Congressmen James Walsh, who chairs the subcommittee, and Amo Houghton, requested the funding on behalf of RIT. The U.S. House of Representatives and the Senate will vote on the bill in the fall.

"The information you can glean from looking at multiple sensors will give you more valuable data than any one source alone," says Donald McKeown, RIT distinguished researcher in CIS.

Like a test site, ISSI will provide the framework for combining and processing data from multiple sensors and fusing them together for producing an information product. ISSI will enable industry to test its technology and communication gear as part of an integrated system.

For instance, data from RIT's wildfire airborne sensor program, or WASP, can be combined with deployable ground-based sensors and a geographic positions system to pinpoint forest fires, creating a complete information package for the U.S Forest Service. The WASP program, along with its

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Study examines gender inequities in IT field

The proportion of young women that make an early exit from information technology programs appears to be higher than the percentage of females that enter this area of study as first-year students. Two faculty members from RIT's B. Thomas Golisano College of Computing and Information Sciences are exploring this troubling trend.

The National Science Foundation has awarded Elizabeth Lane Lawley and Tona Henderson a grant valued at nearly $325,000.

Their two-year study will focus on

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COMMUNITY OUTREACH . . . *RIT President Albert Simone, left, donned work clothes to help with the third annual Habitat for Humanity's Leaders Build on July 31. The house, located on Fulton Avenue, was the latest project completed by construction volunteers for Flower City Habitat for Humanity.*

Life-threatening illness gives RIT professor strength

Rebecca Housel brings more to the classroom than a rich knowledge of literature and the English language. The 32-year-old assistant professor in the College of Liberal Arts teaches her students something about courage and the value of life.

Rebecca Housel

Optimistic and enterprising, Housel has created a life she loves despite physical limitations and an intimate knowledge of cancer. Housel knows first hand how life can be interrupted and works hard to make the most of every day.

Diagnosed with a malignant brain tumor at age 20, Housel has overcome setbacks and challenges with an unwavering faith and will, and the support of her husband, Bob, and son, Gary.

This fall, Housel will join CLA as a full-time lecturer in the language and literature department. She plans to launch a writing club and sponsor a creative writing award. She also will present papers at two regional conferences this fall and publish three scholarly articles. In addition, a young adult novel based loosely on her son is due to be published in the next year.

Housel takes none of her achievements for granted. They are hard won.

"I was just so exhausted," she says of her illness. "I couldn't promote myself, but I was still writing."

Although the radiation treatment in 1991 fried the golf-ball sized tumor near her motor cortex, it didn't stop the growth from returning in full force 10 years later. Seizures—as many as 10 a day—marked the five years leading to her second diagnosis.

"I found out on my 30th birthday that I needed a root canal and neurosurgery. How lucky can one girl get?" she says.

The root canal was a small matter. Then came the 17-hour neurosurgery and nine months of chemotherapy. Her recovery was compounded by diabetes, a side effect of the steroid taken to reduce brain inflammation, and a staph infection in her incision.

A monthlong paralysis followed surgery, as it had the first time, and Housel was left without the use of her left side. She credits her husband for holding together their life, for taking care of her, their son and their house while working full time.

Housel was determined to resume working as soon as she could. She had spent the previous three years juggling adjunct teaching positions at area colleges and was contracted to teach eight classes at RIT. She started chemotherapy treatments the day before winter quarter in 2002 and launched into the new term with enthusiasm. The chemo robbed her of coordination and balance, but not her passion for teaching and for connecting with her students.

"You can't be depressed and curled up in a ball," Housel says. "You have to keep going."

Today she moves around with a walker and a brace supporting her left calf, paralyzed from years of seizures. She remains dedicated to teaching and broadening her students' understanding of life.

"I just love them all," Housel says. "I just want to help them be good students and to get the best experience."

And—for herself—she sees her 60th birthday as a coveted prize, an age she is determined to reach.

"Every wrinkle is great," Housel says. "It's so fantastic. It's great to get old. I aspire to be an old lady with a big purse." ■


AS MUCH FUN AS DISSECTING A FROG (FOR AN ENGINEER) . . . *The Kate Gleason College of Engineering's third annual "I Built My Computer @ RIT" brought 13 women engineering majors to campus for a preview of first-year engineering studies and college life, Aug. 5-8. Students built computers that became theirs to keep and stayed overnight in residence halls. Shown above, Jessica Oakes of Gasport, left, and Erin Race of Knoxboro have their hands full "dissecting" computer keyboards and other components. Workshops were supported by Microsoft Corp.*

Gift to help fund Carver learning center

The Kate Gleason College of Engineering received a commitment for $350,000 from the Estelle H. Carver Charitable Lead Annuity Trust. The gift, creating an endowment fund in support of the Estelle H. and Howard F. Carver Engineering Learning Center, follows a $250,000 donation from the trust for the learning center in 2001.

Located in the James E. Gleason Building, the learning center provides students with an area for individual and group study and access to faculty and student tutoring and reference material.

"The learning center is an outstanding place to interact with students," says Josef Török, professor of mechanical engineering and learning center director. "It represents an affirmation of our student-friendly attitude in the engineering college."


Above, left to right, Linda Halldow, Betsy Carver, Estelle Carver and John Carver

The center is named for Estelle Carver, past president of RIT's Women's Council, and her late husband, Howard, former president, chairman and chief executive officer of Gleason Corp. and 15-year member of RIT's Board of Trustees. An engineering scholarship honoring Howard Carver was established in 1991.

"We are confident that the funds to support this center will help to maintain its operation well into the future," says John Carver, son of Howard and Estelle, and a trustee, with his sister, Linda Halldow, of the charitable trust fund. ■


RIT LIBRARY UNVEILS THE RE:SEARCH ZONE . . . *The latest enhancement to Wallace Library is the newly reconfigured reference area. Herman Miller furnishings have been installed in the first floor area, now called The Re:search Zone.*

Driven by a desire to provide patrons with increased "elbow room", privacy and ergonomic comfort, all seating and work surfaces have been replaced, including the addition of stuffed chairs designed specifically for laptop users.

A unique look into historic debates

In 1834, a group of students took on slavery in a series of debates that forced the issue into public consciousness and permanently into the history of the abolition movement.


Richard Newman

A reenactment of the now famous "Lane Debates" was held in May and involved leading slavery and abolitionist scholars, including RIT's Richard Newman.

Newman, professor of history in the College of Liberal Arts, donned top hat, white shirt, bow tie and a long suit coat with tails, for the costumed flashback to Lane Seminary in Cincinnati.

"The debate is important because these students were saying, 'We're not going to compromise with slavery anymore, and we're going to debate it in public, fully'," Newman says. "Lane students felt most people were not doing anything about slavery."

The reenactment was held at the Beecher House Society in Lichtfield, Conn., childhood home of abolitionist Harriet Beecher Stowe, whose father headed Lane Seminary. In total, 18 scholars reenacted 18 debates—nine in support of abolitionism and nine about the morality of colonization, or deporting free blacks back to Africa. Since no transcripts exist of the debates, the scholars argued based on their expertise about abolitionists' views.

Newman provided commentary and nuance for the 21st century audience. "To give context to the audience, I pretended I was a guy on the outside looking in."

He adds, "For instance, colonization was more popular in the 1830s than people know. Anti-black prejudice didn't just take the form of slavery, but as colonization. Some colonists thought they were really helping the blacks."

The event was co-sponsored by the Beecher House Society, the Gilder Lehrman Center at Yale University, the Cincinnati Museum Center at Union Terminal, the National Underground Railroad Freedom Center and Oberlin College.

Three additional events based on the reenactment will take place across the country during the next year. ■

Arday appointed new School of Art chair

Don Arday says his professional career has migrated from graphic design and advertising design to illustration. But an even grander design took place on July 1 when the College of Imaging Arts and Sciences appointed the RIT illustration professor the new administrative chair for the School of Art.

Associate professor Thomas Lightfoot, who held the post for the past five years, was named CIAS department chair for the Fine Arts Studio.


Don Arday

Like his predecessor, Arday will help promote the identity of the college, work closely with faculty and oversee the curriculum of 250 students in the arts program. Arday is also helping establish a proposed MFA degree in digital illustration, which RIT hopes will be made available to students in 2004-05.

Arday came to RIT in 2001 from the University of Texas at Arlington, where he served as associate professor of graphic communication for 13 years. He received a BFA degree in graphic design from Cleveland Institute of Art and an MFA degree in advertising design from Syracuse University.

Known for his computer art expertise, Arday has produced award-winning illustrations for clients such as Coca-Cola, AT&T, MCI, Sprint, Fidelity Investments, Texas Instruments and CNN. In January 2002, he was the featured artist in *Design Graphics Magazine*, published in Australia and distributed worldwide. ■

Lifetime achiever honored for art prowess


William Keyser Jr.

Professor emeritus William Keyser Jr., who taught furniture design for 34 years at RIT's School for American Crafts, was honored as a teacher and a maker within the studio furniture community for his lifetime achievements. Keyser received The Furniture Society's Award of Distinction at the seventh annual conference in Philadelphia earlier this summer.

His furniture, sculptures and paintings are represented in residential, corporate, ecclesiastical and public art use—gracing the collections of the American Craft Museum, Eastman Kodak, Johnson Wax Company and the Massachusetts Bay Transportation Authority. Keyser is currently an M.F.A. candidate in painting at RIT.

$1.5 million funding *(from page 1)*

predecessor known as FIRES, were also championed by Walsh, and were made possible with federal funding through the NASA budget.

"We are especially appreciative to Congressman Walsh, for his continuing interest in and support of RIT," says RIT President Albert Simone. "The WASP/FIRES research program has made a significant contribution to the state of the art in sensor development, and this new research initiative will enable us to extend the impact of this research to strategic national security applications. We also appreciate the efforts of Congressman Houghton in advocating for RIT on this important project."

Other applications could fall into the homeland security realm where integrated sensing systems could provide critical information to incident commanders.

"Suppose there's been an incident and you have a radiological problem," says McKeown. "You might want to combine an overhead image of a blast site where a dirty bomb went off and combine it with ground-based sensors with radioactive detection levels. ISSI gives responding authorities not just a picture or a read-out of sensors, but a true annotated image map that they can use to make decisions on how to respond."

The process is similar to what McKeown and Michael Richardson, RIT distinguished researcher, are already doing with WASP.

"The architecture is there," McKeown says. "The incident (wildfire; dirty bomb) differs, but the approach is the same. If you set yourself up to be responsive to a large incident, you're helping everybody." ■

Professor weighs in on Regents debate

Sophia Maggelakis, department head of mathematics and statistics at RIT, was recently appointed to the Math A Regents Review Panel to assess the exam that sparked controversy in June with a 63 percent failure rate.

Sophia Maggelakis

Commissioner of Education Richard Mills approved the independent, 13-member panel comprised of educators and other professionals to investigate how the test was designed and whether it was an appropriate measure of achievement. The panel is charged with determining a number of factors including the level of difficulty of the exam compared to previous exams; whether students taking this year's exam differed from prior groups of students; whether the exam results can be analyzed to measure student achievement; and whether other factors could have influenced student performance, such as unclear guidelines about the exam.

The consequences of the poor exam results concern Maggelakis, especially now that the Math A regents exam is a criterion for high school graduation. Although the results for juniors and seniors were overturned, the fallout lingers.

"I think it's very important because it affects so many students' future," Maggelakis says. "When the failure rate is so high, it's important to look at it closely to find out what went wrong."

Maggelakis would like to study and compare previous exams and the curricula to identify any major changes.

"Obviously there's a problem somewhere," she says.

"Something changed this year. It was not required in the past that all students take the exam, and maybe that's a factor. We need to look at all the factors that come into the equation to see what caused this difference." ■

CHANGING OF THE GUARD . . . *Family, friends and colleagues gathered for a Change of Command ceremony for RIT Army ROTC on July 23 in the Fireside Lounge. Lt. Col. Daniel Stafford, professor of military science, center, stepped down after four years as commander of Tiger Battalion, 1st Brigade. Lt. Col. Donald Beattie Jr., professor of military science, shown greeting a well-wisher following the ceremony, succeeds him. Stafford is staying at RIT as assistant dean in the B. Thomas Golisano College of Computing and Information Sciences, effective Aug. 4. This year marks the 35th anniversary since establishment of Army ROTC at RIT.*

Information session

On Wednesday, Aug. 20, the offices of Part-time and Graduate Enrollment Services will sponsor an information forum for adults interested in starting or continuing their education on a part-time evening basis. The forum will be held from 5:30 to 7 p.m. in the Bausch and Lomb Center. For information, call 5-2229.

ISE students compete

A group of fifth-year industrial and systems engineering majors was one of only five teams selected finalists in the ninth International Institute of Industrial Engineers/Rockwell Software Simulation Contest at the IIE annual conference in May in Portland, Ore. As runners-up, the team of Greg Laubisch, Cory Cress and Seth Abbe, and RIT's student chapter of IIE, received $1,750. The students developed a simulation model of an electronics assembly plant to optimize productivity.

New partnership

The Printing Industry Center at RIT welcomes a new partner. The Standard Register Co. joins 14 other firms and associations to pledge resources to the center's operation. Supported by the Alfred P. Sloan Foundation, the Printing Industry Center addresses the growth and profitability of the printing field through educational outreach programs and research initiatives.

The center is a joint program of the School of Print Media and the College of Business. Visit http://print.rit.edu.

Collections on display

Two collections of photographs by Tom Barker, graphic arts and photography alumnus and professor of applied statistics in the John D. Hromi Center for Quality and Applied Statistics, are featured in an exhibit at Canaltown Coffee Roasters, 1805 East Avenue., Rochester.

Earth Images: Photographs by Thomas B. Barker and The Other Side of Tom's Photography are now on display. Some photos were scanned from original film negatives and enhanced in a "digital darkroom." Others are original digital photographs made with modern digital-camera instruments. Visit www.rit.edu/~tbbeqa/photo.htm.

Wright Brothers *(from page 1)*

Langley Full Scale Tunnel in Virginia, Kochersberger focused on wind-tunnel testing of the replica aircraft. Previously, he tested a 1910 Vertical 4 aircraft engine and he and RIT graduate engineering students researched and supported reverse engineering of Wright propellers, airframes and engines at Delphi Automotive Systems in Henrietta.

Two weeks ago, the Federal Aviation Administration issued a special airworthiness certificate for the 605-pound reproduction that Kochersberger and Queijo will fly. After this December's flights, the aircraft will be donated to the Henry Ford Museum in Dearborn, Mich., for its new Heroes of the Sky exhibit.

The aircraft's creation and wind-tunnel tests are documented in photographs by Steve Diehl, RIT associate professor of photographic arts and sciences, at www.rit.edu/upub/kittyhawk. The photo project was supported by RIT's Office of the Provost. ■

Mulligan named new head of MFA program

A nationally recognized expert in photographic history joins the leadership team in the School of Photographic Arts and Sciences. Therese Mulligan has been appointed coordinator of the master of fine arts program and director of SPAS Gallery. Both duties took effect July 1.

Therese Mulligan

Previously, Mulligan served as curator of photography at George Eastman House, a post she held since 1995. She has also been affiliated with RIT since 1999, serving as an adjunct professor of photography.

Other professional experiences include various roles as consultant, lecturer or instructor. She has served as curator for 19 major photographic exhibitions and contributed to nearly two-dozen publications.

"Therese Mulligan will have a significant impact on our academic programs," states Joan Stone, dean of RIT's College of Imaging Arts and Sciences. "Her influence only enhances SPAS' reputation among the nation's top providers of photographic education."

A resident of Rochester, Mulligan has a Ph.D. in art history from University of New Mexico. She earned a master's degree from Michigan State University and a bachelor's degree from University of Missouri-Kansas City. ■

Grants help study fuel cells, ergonomics

CIMS has received two key grants: $250,000 from the Environmental Protection Agency to develop design tools to facilitate and promote sustainable design of proton exchange membrane fuel cells, and $126,754 from the Department of Labor for ergonomics and safety and health training.

Fuel-cell technology may be the wave of the future. But, it must overcome obstacles like the high cost of production, delivery and installation of fuel-cell systems, the hydrogen to power them, and the short- and long-term infrastructure and environmental effects of simply producing and disposing of fuel cells.

A sustainable design approach to fuel cells, examining their total life cycle and end-of-life options, can lower system costs and make the technology more affordable. This approach can also make the technology more environmentally responsible and can maximize product reuse and remanufacturing.

The EPA grant work will be carried out by the Sustainable Systems Research Center at CIMS through July 2004.

The funding was provided to RIT through a Congressional appropriation in the FY 2002 VA/HUD/Independent Agencies Appropriations bill that was supported by Congresswoman Louise Slaughter and Congressman Jim Walsh, who chairs the subcommittee.

Proton exchange membrane fuel cells are the most widely researched type of fuel cell for many industries, including the automotive industry, stationary home powered generators and the telecommunications industry. For a sustainable approach to fuel-cell design, designers of fuel-cell systems need guidelines to assist with the myriad design decisions and trade-offs encountered along the product development path. The CIMS fuel-cell program will develop a comprehensive set of tools and methodologies to be used in the design of next-generation fuel cells.

The Department of Labor grant work carried out by the Occupational Safety and Ergonomics Excellence Program at CIMS will give western New York companies access to ergonomics and health and safety training.

The grant projects will also include assessment surveys, interactive classroom workshops and implementation training projects for participating companies. Companies can participate in any or all of the training activities based on their particular needs. Targeted companies, all located in the western New York regions of Rochester, Buffalo, Syracuse and Binghamton, are manufacturing, construction and healthcare companies lacking the in-house resources to provide this type of training and implementation or are looking to advance their skills in this area. ■

CIMS focuses on reusing wiper cartridge blades

Recycling even the smallest parts can save money and landfill space. That includes the small pieces in everyone's office copier, printer and fax machine.

In a recent study, the Imaging Products Laboratory at CIMS found that up to 95 percent of original equipment manufactured toner cartridge blades can be reused 10 or more times without causing print defects. In fact, a used blade has a slightly less aggressive edge, reducing wear and tear on the OPC drum.

The study also found that it's very difficult, if not impossible, to reliably and repeatedly measure and quantify defects on the wiping edge using conventional means without damaging it in the process.

"Since the results of the study proved that wiper blades showed no functional degradation, even after 10 life cycles, it became clear that a method to assess the cleaning edge of the blade was all that stood in the way of a huge reuse/recovery opportunity," says Nabil Nasr, director of CIMS.

So they built a machine that could.

The Imaging Products Laboratory developed a patent-pending analyzing fixture that is able to detect and define defects in wiper blades without damaging the working edge. The Printer Wiper Blade Assessment System measures the functional condition of a wiper blade's wiping edge.

Nasr discussed a related topic, remanufacturing toner and ink jet cartridges, on CNN's *NEXT@CNN*, Aug. 10. To see the story, visit www.rit.edu/news. ■

Tiny technology shines at RIT Research Symposium

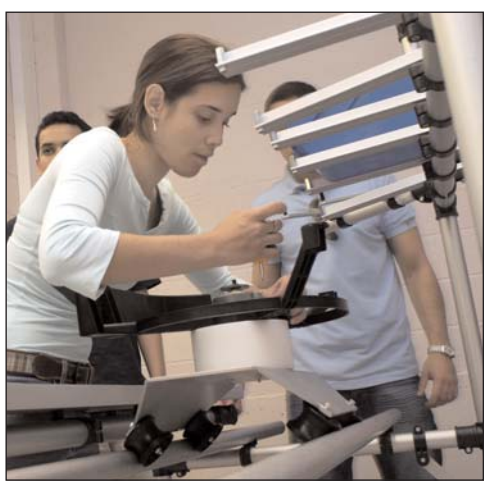
On Aug. 8, RIT's College of Science held the 12th annual Undergraduate Research Symposium featuring 45 students presenting research on topics ranging from Micro Air Vehicles to radio frequency identification tags.

Keynote speaker Ryne Raffaelle, a co-director of RIT's NanoPower Research Laboratory, discussed the wide-open future of nanomaterials, a concept involved in many of the student presentations. Presentations by two of Raffaelle's students included research implementing nanotubes in PEM Fuel Cells, and work involving solar energy cells in space.

Student presentations included a new defense in the battle against biological terrorism that utilizes nanomaterials and a chemical sensor used to detect toxicity levels in the air and provide an early warning in the event of biological attack.

Counter-terrorist efforts will soon owe a debt of gratitude to student research on real-time applications for face-tracking algorithms, software tools for computer vision, and antenna design for radio frequency identification tags.

A century later, RIT student research also honored the Wright brothers' legacy with their research on Micro Air Vehicles—tiny aeronautical devices with endless utility in applications like hostage rescue, urban warfare and intelligence gathering. ■



SUMMER VISITORS TO RIT . . . *Patricia Alonso was one of 34 upper-level college students from the Dominican Republic and Venezuela at RIT for the second Summer Program in Manufacturing, July 21-Aug. 2.*

Sponsored by the industrial and systems engineering department in the Kate Gleason College of Engineering, the program gave students hands-on experience in end-to-end manufacturing including design, prototyping, fabrication and assembly of components and products.

In competition between two teams, students were evaluated on efficiency and output using a simulated automotive manufacturing assembly line.

Focus on RIT student success

This Student Success column, addressing the issues of retention and student success, will appear in News & Events *on a regular basis.*
By Patty Spinelli, director of human resources


Patty Spinelli

When you think of student employment in Finance and Administration, you almost immediately think about the hundreds of students working in food services, facilities and the dreaded parking lot patrol. But students are an integral part of every department of Finance and Administration. Without our students, we would not be able to provide support and services in every aspect of the business of running a major university. We greatly value this partnership in that as much as the students learn about the business operations, they teach us about what they need and want in a university. It is through this daily interaction that we can build on what we do well, stop doing things that no longer bring value to the students as our customers, and most importantly, begin providing services and product that meet the changing demands of the RIT students.

A few years ago, the leadership of the division joined dozens of our students in a daylong retreat to hear first hand what was important to them. We spent a good deal of time understanding the issues as they experience them, and how this influenced their decision to come to RIT, as well as what were the drivers in making their decision to stay at RIT. Finance and Administration is consumed with improving the climate and environment for all of our students. We review on a regular basis the amenities available to students and look to ways to make the physical environment more conducive to social and scholastic interactions.

Every day we work at minimizing, if not eliminating, the operational barriers to their success. For example, the Bursar's Office is empowered to work across boundaries on behalf of a student experiencing financial constraints. By working in partnership with Financial Aid and other departments, we can often help the student discover ways to stay in school.

Finance and Administration sees the role of stewards for student success as one of the most critical contributions we can make to RIT. Our vision is to be the division of choice for students and staff seeking employment at RIT. Like their counterparts in the staff ranks, students have choices as to where they will work, live and socialize. Many of those choices are influenced by the culture of Finance and Administration. Students in our division are members of our community and are therefore treated with the same respect that we afford each other. I look to Finance and Administration to ensure that students are supported not only with a paycheck but also with the guidance and direction they deserve.

One area of concentration is FAST, a student employee team responsible for Web development and system administration. These students service all of Finance and Administration in meeting our growing technological challenges while getting real-time experience on current systems and applications. Students who are employed on campus have a greater probability of success, as defined as graduation. Finance and Administration has the unusual opportunity to support hundreds of students in this way. Each and every member of our community sees and shares in this important goal.


LET THE GOOD TIMES ROLL . . . *Bill and Eileen Whiteside, top right, and Bob and Mary Gulick were the honored guests at this year's annual NRS gala, held July 17. The Whitesides received the prestigious NRS award for their outstanding contributions to RIT, while Bob Gulick, second from right, and his wife, Mary, far left, pictured with Dave and Stephanie Whitaker, received the Gaylord "Gee" Whitaker Service Medallion for outstanding service to their community. This year's theme of* The Great Gatsby *inspired guests to dress the part, above left.*

IT gender study *(from page 1)*

undergraduate women in IT departments. Previous research into women's experiences in computing programs usually centered on computer science departments, which traditionally feature a narrower curriculum than IT.


Tona Henderson and Elizabeth Lane Lawley will lead RIT's study into IT gender issues.

"The goal of the study would be not only to answer these questions," explains Lawley, "but also to develop recommendations for IT program recruiting, curricula and student support, based on those answers."

Lawley and Henderson will conduct a qualitative study of women entering RIT's IT program this fall. The students will be interviewed at various points of the academic year to identify factors relating to their persistence or attrition.

"RIT has made a major commitment to addressing retention problems, and institutional support for research on this topic is strong," says Henderson.

They will also develop a questionnaire for faculty and students intended to identify the presence and influence of those factors in academic departments. The questionnaire will be administered to women entering IT departments across the United States in order to determine whether the RIT findings are comparable to those at other institutions.

More information on the project is available at http://women.it.rit.edu. ■


STICKBALL 2003 CHAMPS . . . *President Simone's team prevailed in the 2003 stickball tournament during the annual Staff Picnic. Team members, from left to right: Scott Sylvester, RIT graduate student; Scott's brother, Chris; Laura Watts, co-op education and career services; Rob Grow, RIT baseball coach; United Way President Joe Calabrese; Simone; and Frank Lamas, associate vice president of student affairs.*


STANDING ROOM ONLY . . . *World-famous Japanese Taiko drummers filled NTID's Robert F. Panara Theatre to capacity during three performances last month, courtesy of The Nippon Foundation of Japan, and NTID's Postsecondary Education Network-International. Audience members were invited on stage to try the unique methods of the Taiko drumming style. The troupe, which includes six deaf members, provides a rhythmic, acrobatic and colorful performance.*

Bob Manning *(from page 1)*

its predominantly African-American student body. Manning will incorporate his Web-based curriculum and train others to teach his seminars at RIT.

Manning's approach to financial education will begin by awareness building and by introducing students to the positive and negative power of credit cards.

"The goal is to learn how to use credit cards as a budget management tool rather than being enticed by the 'magic of plastic,'" he says.

Students will take a cultural and financial literacy quiz followed by a discussion of the consequences of unrestrained credit card use including its future impact on jobs, renting apartments, personal relationships, depression and anxiety.

Part of the program will include testimonials from peers interviewed on television news programs including one student who declared bankruptcy before graduation, and scenes from movies and television shows that portray life in debt.

"With a record 1.5 million personal bankruptcies in 2002 and rising tuition costs, students need to understand the power credit cards hold—both the positive and negative impacts—because it can have such a dramatic impact on their personal and professional futures," Manning says. ■

Obituaries

Frank Benz

Frank Benz, who served as RIT vice president of business and finance, 1959-70, and assistant controller, then controller, 1955-59, passed away May 20. He was instrumental in building the Henrietta campus and in bringing NTID to RIT. He is survived by his wife, Jackie, who was an active member of the RIT community, daughter, Dr. Nicolle Benz and son, F. Paul Benz III.

Shirley Panara

Shirley Panara passed away July 16 at age 80. Panara was a librarian at the Library of Congress and the Rochester School for the Deaf. She was founder and president of Eastern Deaf Women's Bowling Association and was very active in all athletics.

"Shirley Panara shared her husband Bob's passion for the performing arts and throughout her long association with NTID was a dedicated and committed advocate and supporter of NTID's renowned theatre arts department," says Robert Davila, NTID vice president. "Shirley was also a faithful audience member who attended almost every production and 'adopted' a new generation of theatre students. She was a proud and spirited ambassador for the state of the art theatre that bears her husband's name."

Donations may be made in her name to the NTID Performing Arts Fund. A special memorial tribute in her memory will be held at 4 p.m., on Friday, Sept. 12, in NTID's Panara Theatre.

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