

Electrical & Computer ENGINEERING News



Since being named department head in 2003, it has been

my pleasure to share with you the latest successes in the Department of Electrical and Computer Engineering. In the last four years, our faculty, students, and alumni have been widely recognized for their outstanding achievements, and I am quite pleased with our progress. But success is nothing new to the ECE department. As you will read in this issue, we will celebrate 100 years of ECE graduates in spring 2010. Throughout the years, the advancements and contributions of our alumni have made a profound impact on society. We are excited to celebrate a century of innovation and look forward to sharing your stories and your successes, which are the foundation for future engineers.

A. A. Maciejewski

Tony Maciejewski,
ECE Department Head

**Colorado
State
University**

ECE to Celebrate a Century of Innovation in 2010

The Department of Electrical and Computer Engineering is gearing up for a celebration in spring 2010 to commemorate 100 years of graduates. 1910 marks the beginning of a century of innovation, when the first bachelor's degrees in electrical engineering were awarded at Colorado State University.

This is a significant milestone for the ECE department and a time for reflection. In the months leading up to our centennial celebration, we will take a closer look at the department's rich history and the impact our graduates have made on society and the engineering profession. In addition to mapping out an historic timeline of the department, we plan to highlight the many successes of our graduates and faculty over the past 100 years. These stories will be featured in future newsletters as well as the ECE web site. Activities also will be planned to help educate and inform our current and prospective students about the department's innovative past.

Calling All Alumni & Friends: Help Us Commemorate 100 Years of ECE Graduates

We are excited to celebrate our history and look forward to inviting our alumni and friends back to campus in spring 2010. In the meantime, we hope you can help us prepare for this event by sharing your personal stories, photos, and ideas.

- **Nominate a notable alumnus** – We are preparing a list of 100 notable ECE alumni. Do you know someone who has made an impact on the electrical and computer engineering

profession? Send us their name with a brief description of their career accomplishments.

- **Send us your photographs** – Do you have photos from your time at Colorado State University? Please share them with us. Send electronic photos by e-mail or submit hard copies of photos by regular mail (we will scan the photos and return the originals to you).
- **Share your stories** – Did you participate in a cutting-edge project while you were at Colorado State? Were you involved in an exciting research breakthrough?

Tell us about it! We would like to spotlight interesting and innovative projects throughout the years.

- **Join the centennial planning committee** – We are forming a centennial planning committee to help us prepare for the 2010 event and related activities. This committee will communicate primarily via e-mail, so the time commitment is minimal and committee members do not need to live in the Fort Collins area. If you are interested in joining the committee,

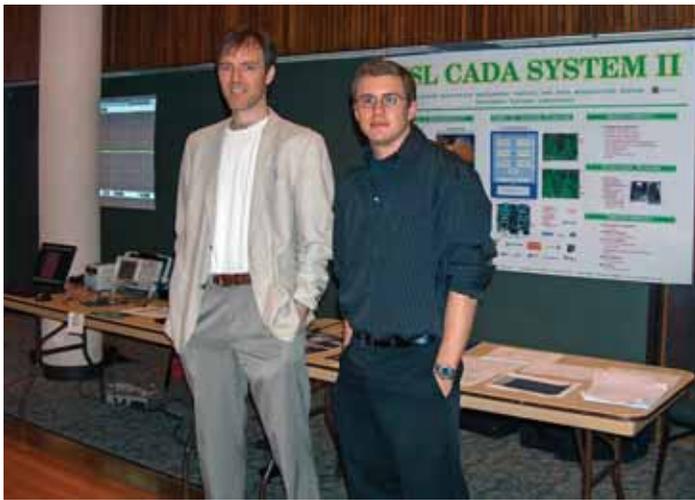
contact Andrea Leland at the e-mail address listed below.

Send your ideas, stories, and photos to:

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Electrical & Computer
ENGINEERING



Pat Kusbel (left) and Elliot Buller were named the winners of the 2007 Best Paper Contest.

Kusbel and Buller Honored for Best Senior Design Paper

The ECE department announced the winner of the 2007 Best Paper Contest at its spring graduation reception on May 11. Senior design students Pat Kusbel and Elliot Buller received the award for their paper entitled, “Control and Computing System for the Compact Microwave Radiometer for Humidity Profiling.”

They each received a \$300 cash award and a certificate from the IEEE Denver Section and the local IEEE Solid-State Circuits Society, the sponsors of the contest. Pat and Elliot’s embedded control and computing system will reduce volume and power consumption as well as enhance system reliability. Their work enhances ongoing microwave radiometer research sponsored by the National Science Foundation.

The Best Paper Contest provides students an opportunity to showcase their writing skills and compete for a cash prize. The judges, a panel comprised of volunteers from the ECE Industrial Advisory Board and the IEEE, selected their paper for its exceptional technical content, organization, development, clarity, style, and grammar.

The ECE department will again host a Best Paper Contest next spring. The contest is open to all senior design students.

Class Notes

Please send your professional and family updates to ece@engr.colostate.edu. Your news will be published in the next ECE newsletter.

Kumara Guru (MSEE '05) is a project leader for The Boler Company in Itasca, Illinois. He is responsible for all projects related to computers and information technology, including service-oriented architecture projects. Kumara can be reached at kumaraguru_10@hotmail.com.

This newsletter is produced twice yearly by the Department of Electrical and Computer Engineering. Please send story ideas and comments to:
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ECE Launches Peer Mentoring Program

Pursuing a degree in electrical and computer engineering is a big step filled with excitement and uncertainty. There is much information to absorb, many people to meet, and a rigorous course load to undertake. To assist students with this important academic and social transition, the ECE department is kicking off a new Peer Mentoring Program.

Serving as a support system for first year, second year, and transfer students, the Peer Mentoring Program provides opportunities for new students to connect with upperclassmen, or Peer Mentors, who have demonstrated leadership and academic success. Regular group meetings with Peer

Mentors are designed to help new students gain a sense of belonging, learn about the department and its courses, establish career goals, boost self-confidence, and develop effective study skills.

“I am excited and honored to serve as a Peer Mentor,” said senior Alexandria Repasky. “I know from experience that adjusting to college life and engineering studies can be challenging.” She continued, “I look forward to working with new students, helping them adapt, grow, and succeed in our program.”

In addition to improving the overall quality of the ECE undergraduate experience, the long-term goal of the program is to improve student retention and increase graduation rates.

New Scholarship Opportunity for FIRST-rate Students

This fall the ECE department will offer up to five renewable scholarships for high school students participating in any *FIRST* (For Inspiration and Recognition of Science and Technology) program. *FIRST*, a not-for-profit organization, designs accessible, innovative programs, like the *FIRST* Robotics Competition, that motivate young people to pursue education and career opportunities in science and technology.

By making the scholarship funding available exclusively to *FIRST* participants, the ECE department will reach 28,000 motivated high school students across the United States and Canada, a target audience that represents the future science, engineering, technology, and business leaders that are so greatly needed.

“The recruitment of high ability students is an important priority for the department right now, and we are really trying to focus our efforts,” said Karen Ungerer, ECE recruitment coordinator. “The *FIRST* scholarship allows us to reach a key group of students who have demonstrated success in relevant disciplines.”

Applications for the *FIRST* scholarship are due by March 1, 2008. For additional information, visit www.usfirst.org/scholarships or contact Karen Ungerer at kungerer@engr.colostate.edu.

Student Spotlight: Standout Student Dreamed of Being an Engineer



Sharmila Padmanabhan is a top student in the ECE graduate program. She enjoys practicing yoga in her spare time.

Graduate student Sharmila Padmanabhan has always reached for the stars. From the time she was a little girl, she has been interested in space and satellites. “I did not want to be an astronaut,” said Sharmila, “I dreamed of being an engineer and building space instruments for the good of humanity.”

Today, her dreams are coming true as she works toward her Ph.D. in electrical engineering at Colorado State University. With a 3.98 G.P.A., Sharmila is making excellent contributions in research at the Microwave Systems Laboratory led by Dr. Steven C. Reising, developing ground-based instrument prototypes for future satellites to provide new and more complete measurements of the atmosphere. It is anticipated that measurements from these instruments will be used to improve advance prediction and warning of severe storms.

The 2007 recipient of the College of Engineering Shrake-Culler Scholarship, Sharmila has earned recognition and

student paper awards from prominent organizations such as the IEEE and the International Union of Radio Science. She also received a grant for collaborative research at the National Center for Atmospheric Research in Boulder, Colorado, during the Fall 2006 semester.

Sharmila earned her bachelor’s degree in electronics and telecommunication from the University of Mumbai, India, and her master’s in electrical and computer engineering from the University of Massachusetts Amherst. She hopes to secure a postdoctoral position in a research lab upon graduation from Colorado State, expected in 2008.

Outside of the lab, Sharmila enjoys performing music, including playing the violin, keyboard, and mandolin, as well as singing. She is a member of a small music group in Fort Collins that plays classical and popular Indian music for local festivals. She loves to read and cook vegetarian fare. Sharmila enjoys practicing yoga as well.

2007-2008 ECE Scholarship Recipients

Undergraduate Scholarships

Aram Budak ECE Fellowship

- Leah Belval
- Elizabeth Van Diemen

Allen Porter Mowry Memorial Scholarship

- Teodoro Peralez

Achievement Rewards for College Scientists (ARCS) Scholarship

- Steven Turner

Electrical and Computer Engineering Alumni Undergraduate Scholarship

- Casey Craig
- Paul Trozan

Electrical and Computer Engineering Undergraduate/Graduate Scholarship

- Christopher Riddle

Engineering College Scholars Scholarship

- Liza Bodistow
- Josh Dickerson
- Brian Hicks

Fry Family Electrical Engineering Scholarship

- She-Ming Allen Chen

George T. Abell Scholarship

- Jesse Parker

John and Amy Lawton Scholarship

- Ryan Hoppal

Lee and Bette Wehrman Scholarship

- Wilson Foster
- Ryan Selby

Micromotion Engineering Scholarship

- Pamela Ackerman
- Lauren Netherton
- Iris Yi

Thomas A. Brubaker Scholarship

- Jarrod Zacher

Walter Scott, Jr. Scholarship

- David Seht

Willis T. Johnson Scholarship

- Erin Bickely

Graduate Scholarships

Perl Family Graduate Fellowship

- Mike Buehner

Sjostrom Family Scholarship

- Patricia Barbosa

Shrake Culler Graduate Scholarship

- Sharmila Padmanabhan

International Society for Optical Engineering (SPIE)

- David Alessi
- Fernando Brizuela

College Accepting Nominations for 2008 Distinguished Alumni Awards Program

Each year the College of Engineering (COE) honors one outstanding alumnus from each of its five academic departments, as well as a graduate of the last decade.

Recipients of the COE Distinguished Alumni Awards are former students whose accomplishments in their careers, service to industry and the public, and/or volunteer efforts have brought honor to that individual, the College of Engineering, and to Colorado State University.

To nominate someone for a Distinguished Alumni Award, please complete the online form at www.engr.colostate.edu (under the Alumni and Friends link) by December 14, 2007. Candidates may only receive one award every five years. Self nominations are accepted.

Awards will be presented at the College’s annual awards dinner on Saturday, April 19, 2008. For questions, contact the COE Office of Development at (970) 491-3110.

Upcoming Events

Engineering Exploration Day: October 13

High school students, their parents, and community members can explore engineering majors and careers at Colorado State University. The event will be held on campus in the Lory Student Center, Engineering, and Glover buildings from 9 a.m.- 3:00 p.m.

ECE Industrial Advisory Board Meeting: October 19

The bi-annual ECE Industrial Advisory Board (IAB) will be held in the Lory Student Center's Longs Peak Dining Room. For membership information as well as past meeting notes and presentations, visit the ECE website: www.engr.colostate.edu/ece/ind_relations/IAB.shtml.

Annual IS&T High School Day at CSU: November 2

To attract and retain information, science, and technology majors, the Information Science and Technology Center, or ISTeC, will host its annual recruiting event for high school students and counselors. Go to istec.colostate.edu for details.

Engineering Innovations Breakfast Series: Bartels Scheduled for November 8

The Engineering Innovations Breakfasts are a great opportunity to interact with alumni, friends, and former professors, as well as hear updates on technological trends and innovative research projects. All breakfasts begin at 7:30 a.m. and conclude by 9:00 a.m. ECE Associate Professor Randy Bartels will give a talk in the CSU Lory Student Center on November 8 entitled, "Dancing Molecules for Biological Imaging."

ECE Seminar Series

The ECE department is hosting an on-campus seminar series featuring guest lectures by technical experts in industry and academia. Visit www.engr.colostate.edu/ece/seminars.shtml for a complete listing of upcoming talks.

Fall Commencement: December 15

The College of Engineering Fall 2007 Commencement will take place at 4 p.m. on Saturday, December 15, in the Lory Student Center Main Ballroom.

College of Engineering Two-Day Career and Internship Fair: February 13 and 14

The College of Engineering Career & Internship Fair has grown to a two-day event. Geared specifically toward students interested in engineering, science, technology, math, and related fields, the annual fair will take place in the CSU Lory Student Center. For questions or to register your company, contact John Haines, engineering career center liaison, at (970) 491-6220 or john.haines@colostate.edu.

Engineering Days: April 18

Plan to join the ECE department for the 2007 Engineering Days celebration in the CSU Lory Student Center. Student projects will be on display for viewing by the public.

Annual Alumni and Friends Awards Dinner: April 19

Mark your calendar for the College of Engineering Annual Alumni and Friends Awards Dinner at the Fort Collins Hilton. Additional details will be announced soon. For questions or to RSVP, contact the College of Engineering at (970) 491-7028 or supportengineering@colostate.edu.

www.engr.colostate.edu/ece

Can You Identify This Alumnus?

Can you name the alumnus featured here? Call (970) 491-6600 or send an e-mail to ece@engr.colostate.edu.



The photo is from 1940, a big year for animated cartoons that are still popular today. Bugs Bunny made his official debut, Woody Woodpecker first appeared in the film *Knock Knock*, and Pinocchio was released by Walt Disney Productions. The first Social Security benefit checks were paid out in 1940, Winston Churchill became Britain's Prime Minister, and John Steinbeck received the Pulitzer Prize for his novel, *The Grapes of Wrath*.

Watch for an update in the next ECE newsletter.

Update:

Dr. Carl Wilmsen, ECE emeritus professor, contacted the department to identify the alumnus featured in the 1967 photo with a vacuum evaporator. Don Thomas, MSEE '68, was Wilmsen's first master's student.





Students prepare to move in to the new Academic Village, a brand-new living and learning facility for engineering majors and honors students.

New Academic Village Equipped for 21st Century

Integrating living and learning helps students thrive academically, say Colorado State University administrators, who are not just offering lip service but are committing to student success by building a new, \$42 million Academic Village.

The facility, which opened in August, combines living and learning into a single community of residence halls and a dining commons for 240 students from the College of Engineering and 180 students in the Honors program. The engineering facility also includes a faculty/staff residence currently home to Aaron Benally, coordinator of the Women and Minorities in Engineering Program, and graduate student apartments, now home to three engineering graduate students.

Designed with input from CSU students, faculty, and staff, the new environmentally friendly facility incorporates green-building techniques and a functional design tailored to each program. The facility features ultra low-flow water fixtures to conserve water use, a wind power option for students to purchase, and an educational information display on energy consumption. In the two-story, 44,000-square-foot dining commons, set to open in January, a device called a pulper will compact food waste using water, then re-circulate the water.

The community also will feature a thin-client architecture sponsored by Sun Microsystems and a design studio sponsored by Lockheed Martin Corporation and modeled after the Lockheed Martin Engineering Design Studio in CSU's Engineering Building. Unlike the use of jump or flash drives, Sun Microsystems' Sun Ray computer stations will access entire work sessions using ID cards. Students simply insert their smart chip student ID into the Sun Ray system, and the entire desktop, not just saved documents, will appear.



The first residents of the Colorado State University Academic Village gather for a group photo in the courtyard.

New Event Showcases Department's Multidisciplinary Work

ECE, in collaboration with the Atmospheric Science (ATS) department, hosted a new type of event in June designed to highlight the exciting interdisciplinary work under way in the College of Engineering, while recognizing industry support.

The luncheon event was held in honor of Ball Aerospace and Technologies Corp. (BATC) for their ongoing support, including their recent collaborative projects with Associate Professor Steven Reising and ATS Professors Graeme Stephens and Chris Kummerow. BATC scientists are working with Colorado State to develop new satellite instruments to gather detailed atmospheric weather data, with the ultimate goal of improving advance prediction and warning of severe storms.

The luncheon featured research presentations from ECE and ATS faculty and graduate students. The talks highlighted current and future work, demonstrating the strong interdisciplinary connections between the two engineering departments. BATC President and CEO David Taylor was in attendance along with key executives and managers from the corporation, including engineering alumnus Drew Crouch, vice president and general manager of Advanced Technologies and Products.

"The luncheon is one example of the many ways in which we are trying to engage industry," said Tony Maciejewski, ECE department head. "The support we receive from our industry partners is invaluable. This type of event not only gives us an opportunity to say 'Thank you,' but also to share our latest projects and breakthroughs."

The ECE department would like to host similar events in the future for its industry partners. If your company would like to participate in an event to learn more about the department's research and student projects, please contact Andrea Leland at ece@engr.colostate.edu.



Chandra Receives NWS Medal of Excellence

ECE Professor V. Chandrasekar (Chandra), deputy director of the National Science Foundation Engineering Research Center for Collaborative Adaptive Sensing of the Atmosphere (CASA), was awarded a Director's Medal of Excellence by the National Oceanic and Atmospheric Administration's (NOAA) National Weather Service (NWS).

The award recognizes CASA's growing significance and importance to the NWS, particularly in shaping the organization's future and mission. Chandra accepted the medal after making a presentation to NOAA board members on CASA radars' precision accuracy in finding tornadoes. According to the NWS, an average 800 tornadoes are reported across the United States every year, leading to more than 1,500 injuries and at least 80 deaths.

The CASA radars are located in Oklahoma's tornado alley, but Colorado State faculty and students monitor the radars 24 hours a day, seven days a week from computers in the College of Engineering. The radar system is the result of a multidisciplinary collaborative effort

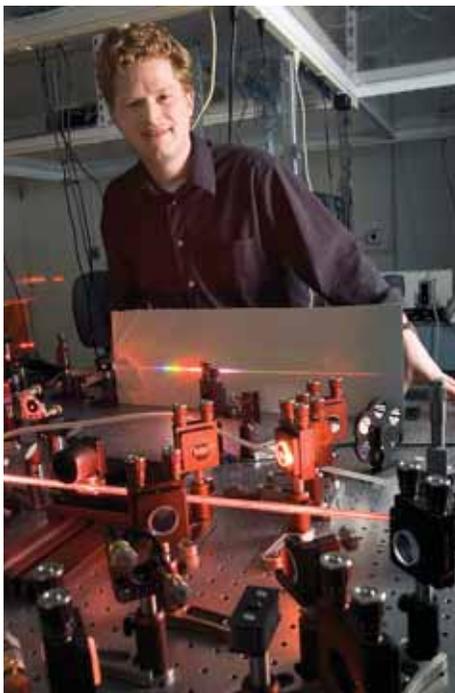


among all of CASA's partners: Colorado State, the University of Massachusetts, the University of Oklahoma, and the University of Puerto Rico.

Chandra, who has made pioneering contributions in the area of polarimetric

radar observations of the atmosphere, is a Fellow of the Institute of Electrical and Electronics Engineers and the American Meteorological Society. He received his Ph.D. in electrical engineering from Colorado State in 1986.

Bartels to Join World's Brightest Young Engineers at National Symposium



ECE Associate Professor Randy Bartels, along with eighty-two of the nation's brightest young engineers, has been selected to take part in the National Academy of Engineering's (NAE) 13th Annual U.S. Frontiers of Engineering Symposium. The event will bring together engineers ages 30 to 45 who are performing exceptional engineering research and technical work in a variety of disciplines. The participants – from industry, academia, and government – were nominated by fellow engineers or organizations and chosen from more than 260 applicants.

"It is exciting to witness the energy when outstanding engineers from many different fields come together in this unique venue," said NAE President William A. Wulf. "Frontiers of Engineering is a proven mechanism for traversing engineering disciplines. By exposing bright young minds to developments in areas other than their own – and giving them lots of time to interact – Frontiers enables advances in approaches and thinking that would not have occurred otherwise."

Over the course of three days, the U.S. symposium, to be held at the Microsoft Research Center in Redmond, Washington, will cover subject matter in a variety of fields. This year's topics include trustworthy computer systems, safe water technologies, modeling and simulating human behavior, biotechnology, biotechnology for fuels, and chemicals and the control of protein conformations. Participants will have the opportunity to attend talks and discussions, allowing the exchange of ideas and cultivation of collaborations.

Bartels, who received his doctorate in electrical engineering from the University of Michigan in 2002 and joined Colorado State in 2003, has been honored with numerous awards in his young career from many disciplines – engineering, physics, chemistry, computer science, and optics.

New Faculty Join ECE



Dr. Diego Krapf is a new assistant professor in the Department of Electrical and Computer Engineering. Dr. Krapf's research experience includes infrared photodetectors, semiconductor quantum dots and quantum wells, porous silicon, nanoelectrodes for electrochemistry applications, and nanopores as DNA sensors. His current work lies at the interface between engineering, physics, and biology at the nanometer scale. At Colorado State, Krapf is pursuing research using nanoscale devices to unravel the dynamic behavior of protein-DNA complexes, crucial in understanding human diseases, including many types of cancers and neurological disorders. Prior to joining ECE, Krapf worked as a postdoctoral fellow at Delft University of Technology in the Netherlands. He received a bachelor's degree in physics from the Hebrew University of Jerusalem in Israel in 1997, and a master's degree and Ph.D. in applied physics from the Hebrew University in 2000 and 2004, respectively.

He and his wife, Susan, are the parents of Alessandro, who was born in November 2004, and has recently started attending pre-school in Fort Collins. In his free time, Krapf enjoys scuba diving, ultimate frisbee, reading, and playing board games. He hopes to improve his skiing skills this winter in the Rocky Mountains.

Dr. Ricky Kwok joins the ECE department as an associate professor of electrical and computer engineering. Dr. Kwok's current research interests are primarily related to security and incentive issues for wireless systems and resource management for dynamically reconfigurable multiprocessor systems. He most recently served as an associate professor at the University of Hong Kong, where he received the Outstanding Young Researcher Award in November 2004.



Kwok also was a visiting scholar at Purdue University from August 1997 to July 1998, and served as a visiting associate professor at the University of Southern California from August 2004 to July 2005. Kwok received his bachelor's degree in computer engineering from the University of Hong Kong in 1991. He earned a Master of Philosophy and a Ph.D. in computer science from the Hong Kong University of Science and Technology in 1994 and 1997, respectively.

A soccer fanatic, Kwok regularly played striker every Sunday for the University of Hong Kong's staff team. A severe hamstring injury has recently prevented Kwok from playing soccer as competitively as he has in the past. Nonetheless, he still trains with weights four days a week in the Student Recreation Center.

U.S. Air Force Under Secretary and Former Astronaut to Join ECE

Ronald M. Sega, former NASA astronaut and most recently the Under Secretary for the U.S. Air Force, will join the Department of Electrical and Computer Engineering as a professor of Systems Engineering and as vice president for applied research for the Colorado State University Research Foundation, or CSURF. Sega brings decades of experience in applying academic research



to real-world situations. Since his 2001 appointment as Director of Defense Research and Engineering (DDR&E) at the U.S. Department of Defense, Sega has focused his efforts on three areas of emphasis: energy and power, aerospace, and knowledge and surveillance. While he served as the DDR&E, the science and technology budget grew by 40 percent to \$10.5 billion in 2005 from \$7.5 billion in 2001. As Under Secretary of the Air Force since August 2005, Sega was responsible for developing an energy strategy that included an emphasis in renewable energy. The Air Force purchased approximately 1 million megawatt hours of renewable energy in 2005 and 2006. Sega is renewing his own strong ties in Colorado, formerly serving as the dean of the College of Engineering and Applied Science at the University of Colorado, Colorado Springs from 1996 to 2001. "Ron's remarkable experiences will benefit not only the students and researchers on campus, but companies in the private sector that need highly educated, well-trained engineers," said Dr. Larry Edward Penley, president of Colorado State University. "Ron Sega is one of our nation's most seasoned and respected military leaders, and he brings an extraordinary body of experience and knowledge to the university. We are honored to welcome him to Colorado State where his work will continue to build on CSU's reputation of excellence as one of the top research universities in the nation."

"Colorado is expanding its activities in energy research and systems engineering, and Colorado State University is engaged in important research in renewable power sources, biomedical research, and infectious disease study," said Sega. "I look forward to joining the CSU team and hope to support increased collaboration with the community."

Sega began his work at Colorado State in September. A former astronaut, he flew two missions into space – on the Space Shuttle Discovery in 1994 and as the payload commander for the third shuttle/Mir docking mission aboard Atlantis in 1996. Sega received his bachelor's degree from the U.S. Air Force Academy, his master's degree from The Ohio State University, and his doctoral degree in electrical engineering from the University of Colorado.

Rocca Named Colorado State University Distinguished Professor

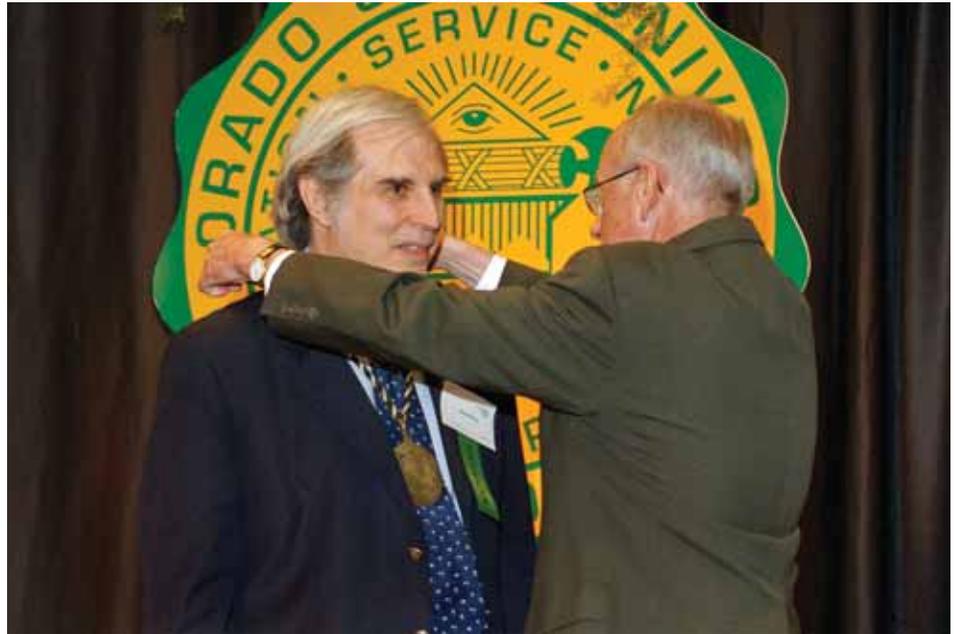
Dr. Jorge Rocca, professor of electrical and computer engineering at Colorado State University, was honored by President Larry Edward Penley as a University Distinguished Professor – the highest recognition awarded for outstanding accomplishments in research and scholarship – at the annual “Celebrate Colorado State” luncheon in April. Rocca was one of four CSU professors to receive the award.

“These fine individuals join a very small, prestigious group of University Distinguished Professors because of outstanding accomplishments in their respective fields,” Penley said. “The quality of our research and teaching is driven by the talent of our faculty. They ensure that we contribute to the development of new and useful knowledge – in keeping with our mission – but also expand recognition of Colorado State. We congratulate them on their achievements.”

As part of his acceptance remarks, Rocca thanked his wife, ECE Professor Carmen Menoni, and acknowledged the contributions of his students and researchers. He said his success would not have been possible without the hard work and dedication of these individuals.

Each University Distinguished Professor receives a special medallion and a permanent base salary increase. A maximum of 12 current faculty members at the University may hold the rank of University Distinguished Professor, which is a permanent designation that carries into retirement. To obtain the rank, faculty members are nominated through an extensive review process and must be approved by the current University Distinguished Professors. Dr. Penley approved the selections and secured endorsement from the University’s governing board.

Dr. Rocca is a world leader in the development of compact X-ray lasers and their applications. He serves as director of the National Science Foundation Engineering Research Center for Extreme Ultraviolet Science and Technology, which is based at Colorado State but is a collaborative effort with the University of Colorado at Boulder and the University of California at Berkeley.



Dr. Jorge Rocca accepts his University Distinguished Professor Award from President Larry Edward Penley.

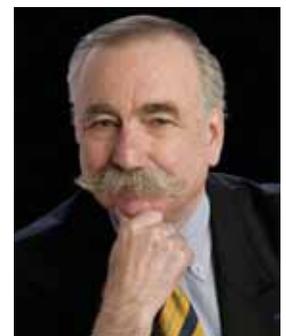
Rocca, who obtained his doctoral degree in electrical engineering from Colorado State in 1983, is a Fellow of the Optical Society of America, the American Physical Society, and the Institute of Electrical and Electronic Engineers. He has published his seminal work on EUV and soft x-ray laser research in more than 160 peer reviewed journal papers that have accumulated more than 2,200 citations in scientific literature (source: ISIS Web of Science), including individual papers that constitute major milestones in the

field with more than 260 citations. He also has authored or co-authored nearly 300 conference proceedings and conference presentations, including approximately 100 invited presentations and plenary talks at international conferences. These innovative scientific contributions also have merited the attention of the most prestigious scientific publications, such as *Science*, *Physics Today*, *Physics World* (UK), *Laser Focus* (US), *Parity* (Japan), and *Physikalische Blätter* (Germany).

Alumnus Receives Prestigious Lifetime Achievement Award

ECE alumnus Dr. Thomas W. Williams, EE Ph.D. '71, was selected to receive the European Design and Automation Association (EDAA) Lifetime Achievement Award. The highly prestigious award is given to individuals who have made outstanding contributions during their lifetime to electronic design, automation, and testing of electronic systems, greatly impacting the way electronic systems are designed. The award was presented to Williams at the plenary session of the 2007 DATE (Design, Automation, and Test in Europe) Conference in Nice, France.

Williams, a member of CSU’s ECE Industrial Advisory Board and the ECE Hall of Fame, is a Fellow at Synopsys, Inc. and serves as an adjunct professor at the University of Calgary in Alberta, Canada. Prior to joining Synopsys in 1998, Williams was manager of the VLSI Design for Testability group at the IBM Microelectronics Division in Boulder. He received a bachelor’s degree in electrical engineering from Clarkson University, a master’s in pure mathematics from the State University of New York at Binghamton, and a Ph.D. in electrical engineering from Colorado State University.





Special Recognition July 1, 2006 - June 30, 2007

Donors to Electrical and Computer Engineering

The ECE faculty, staff, and students would like to extend our sincere appreciation for your ongoing support of our departmental initiatives and programs. Your support truly makes a difference.

Every effort has been made to ensure the accuracy of this donor honor roll. Please advise us of any errors by calling (970) 491-6600 or e-mail ece@engr.colostate.edu. We appreciate the opportunity to correct our records. Listing is by graduation year.

1900-1939

Frank and Hazel Gray
Frank Hess

1940-1949

Keith Eddy
William and Barbara Gepford
Ralph and Mary Green
H. Norris and Mary Lou Lynch

1950-1959

David and Evelyn Akers
Wilbert and Patricia Aldrich
Richard Farmer
Galen Herstein
Samuel W. and Wilhelmina McCandless
William McCarty
F. Gordon Noble
Raul Pettai
Robert Phelps
Bruce and Hazel Reeder
Lloyd and Julia Spafford
J. K. Williams
Donald and Donna Willis

1960-1969

Leopoldo and Linda Barrios
James and Joanne Brownrigg
Myron and Nancy Calhoun
Michael and Judith Chandler
Chris and Georgia Christopher
Newel and Glenna Cutler
Rodney Diehl
Calvin and Carol Eddleman
Walter and Susan Green
Robert and Carleen Grossman
Roger Hedlund
William and Jean Hurt
Robert and Susan Johnson
Douglas and Anne Kallesen
John Kautter
James and Marilyn Michaud
Stuart and Linda Morgan
Bardwell and Kathleen Moss
Robert and Ann Neal

Bill and Becky Parzybok
Stanley and Carolyn Pence
Joseph and Barbara Phillips
Richard and Sandra Remick
Gary and Vicki Reynolds
John and Rosemary Riggen
Y. G. Tsuei
Gene and Karen Weeks
Robert and Judith Zamborelli

1970-1979

John and Betty Becker
Terry and Patricia Boucher
John and Annette Briggs
Salah and Ibtisam Duwaik
David Farden
Stephen and Sara Goodnick
Robert and June Hazelton
Stuart and Edith Kramer
George and Donna Laughlin
Stephen and Nancy Malyszko
Frederick and Sheilah Mann
Michelle McKee
James Mehring
James and Debra Meisner
Randall and Maurine Moore
Edward O'Brien
Jeffrey and Donalu O'Neil
Walter Perdue and Lisa White
Charles and Debra Pitman
Robert and Theresa Reich
Paul and Rebecca Rinne
Kelly and Marsha Robinson
Randy Rowan
George and Patricia Stoll
Don Stuehm
Yaujen and Hsiu Chen L. Wang
Thomas Williams and Candace Merrill-Williams
Lee and Diane Zieroth

1980-1989

Eric and Heidi Aas
Gary and Lynn Barbari

Kenneth and Lori Bernhardt
David and Lori Berry
Bobby Binckes and Amy Lockwood
Lowell and Laura Bohn
Charles E. Brady
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