

# Campus Observer

June 17, 2009 A Newsletter for the Florida Tech Community Vol. 10 Issue 6

## Rocket Team Takes Third in Competition

The Florida Tech rocket team took third place overall and earned the Rookie of the Year Award in the 2009 University Student Launch Initiative (USLI). Nineteen universities competed, including Vanderbilt University, Georgia Institute of Technology and Embry-Riddle Aeronautical University. Utah State University placed first and University of Alabama, Huntsville, took second place.

The teams launched their rockets April 18 at NASA's Marshall Space Flight Center in Huntsville, Ala. The competition wasn't over, however, until the analyses and documentation were submitted by late May.

Florida Tech's 30-pound rocket, Panther II, reached an altitude of 5,020 feet, close to its target goal of 5,280 feet. The team also received an early award for Best Payload Design. Their payload was a fuel slosh experiment to monitor how fluids move during rocket acceleration. The findings are applicable to NASA's next-generation Constellation Program.

The initiative is sponsored by Alliant Techsystems (ATK) and hosted by NASA's Huntsville center.

The teams were judged by panels of NASA scientists and engineers, and their partners who rated students on design, test flight and meticulous documentation.

The Florida Tech team advisers were **Daniel Kirk** and **Hector Gutierrez**, mechanical and aerospace engineering; and **Greg Peebles**, university safety officer.

## Summer Academy at KSC to Launch July 5

The university is collaborating with NASA to offer the Governor's School for Space Science and Technology for gifted Florida high school seniors. The summer school, funded by the Florida legislature, will take place primarily at Kennedy Space Center (KSC) July 5 to 17. There are slots for 18 students.

Former astronaut **Sam Durrance** and **Niescja Turner**, physics and space sciences faculty members, will lead the two-week residential summer academy. They will also direct the students in a research project that involves preparing a specialized camera for flight onboard an F-104 Starfighter jet and analyzing the data.

Students also will learn from scientists and engineers at KSC laboratories, focusing on current lunar exploration research.

A \$500,000 contract from the State of Florida Department of Education funds a joint initiative for the Governor's School among Florida Tech, Embry-Riddle Aeronautical University and Florida State University.



Florida Tech faculty members Niescja Turner (pictured left) and Sam Durrance stand beside an F-104 Starfighter jet, which will be used as part of an experiment at the Governor's School for Space Science and Technology this summer.

## They're Excellent

The university's 2009 Faculty Excellence Award winners for outstanding performance are **Veton Kėpuska**, associate professor of electrical and computer engineering, the Kerry Bruce Clark Award for Excellence in Teaching; **Kurt Winkelmann**, associate professor of chemistry, the Andrew W. Revay Jr. Award for Excellence in Service; and **Marc Baarmand**, professor of physics and space sciences, the Award for Excellence in Research.



From left, Florida Tech 2009 Faculty Excellence winners Kurt Winkelmann, Veton Kėpuska and Marc Baarmand.

# Faculty and Staff News

## Office of the President

President **Anthony J. Catanese** recently was invited to give the keynote address at the National Planning Conference of the American Institute of Certified Planners in Minneapolis, Minn. His well-received presentation was "Mastering leadership." He is a Fellow of the institute.

## Office of Strategic Initiatives

At the Global Supply Chain Management Conference at Plattsburgh State University of New York, **Cliff Bragdon** presented the keynote address, "Integrating the physical and electronic components of security to develop an overall solution for your supply chain."

## College of Business

**Deborah Carstens** coordinated the Activity Based Total Accountability (ABTA) Institute's National Conference on Innovations in Government Accountability and Performance at the Hilton Melbourne Beach Oceanfront Hotel in May. Nineteen speakers made presentations, including The Honorable Earl E. Devaney, chair of the Recovery Accountability and Transparency Board; Congressman Lisa Parker, Government Accounting Standards Board; Cheryl Whitaker, Government Accountability Office; and Gary Vandlandingham, director of the Florida Office of Program Policy and Government Accountability.

## College of Engineering

**Abhijit Chakravarty**, Syed Murshid's doctoral student, received a \$3,000 SPIE Scholarship in Optical Science and Engineering. Chakravarty will be honored in a special program in August.

**Pei-feng Hsu** earned the President's Award from the American Society of Heating and Refrigeration Engineers, (ASHRAE)



Pei-feng Hsu

Space Coast Chapter, for his work to establish a student branch of ASHRAE on campus.

**Dan Kirk** was awarded a \$300,000 grant by the Office of Naval Research (ONR) to study JP-8 fuels. The fuels power military aircraft and other high performance vehicles and equipment, including tanks, power generators and space heaters.

**Pierre Larochelle** received the American Society of Mechanical Engineering (ASME) Fellow Award. The Fellow grade of membership recognizes exceptional engineering achievements and contributions to the engineering profession. As a Fellow, Larochelle is one of only approximately 3,000 out of more than 100,000 ASME members.



Pierre Larochelle

Under the sponsorship of the Department of State's International Visitor Leadership Program, **George Maul** hosted two business leaders from Turkmenistan April 13–May 1. The program, titled "Climate change and renewable energy: A project for Turkmenistan," was arranged by the World Learning Visitor Exchange Program.

**Manolis Tomadakis** presented an invited lecture at the University of South Florida's Department of Chemical Engineering. The lecture was about his research on the transport, reaction and nuclear magnetic relaxation properties of fibrous and porous media.

## College of Psychology and Liberal Arts

**Julie Gross** won a plaque for her membership on the Sexually Violent Predator Program Assessment Improvement Team in the 2009 Prudential-David Productivity Awards competition.

**Radhika Krishnamurthy** presented the roundtable discussion "Linking training and practice in personality

assessment" at the annual meeting of the Society for Personality Assessment in Chicago, Ill.

**Bob Taylor** was among the department of humanities and communication faculty who made the department's first Creative Writing Institute a success in May. Others who taught were **Cindi Courbat**, **Marcia Denius**, **Jason Harris**, **Andy McIlwraith**, **John LaVelle** and Florida Poet Laureate **Edmund Skellings**.

**Fran Warkomski** is the 2009 recipient of the Behavior Analyst Certification Board's (BACB) Michael Hemingway Award. She earned the award for her contributions to behavior analysis and BACB certification.

**Vanessa Edkins** and Warkomski were selected to attend, with all expenses paid, the 2009 Child Advocacy Studies Conference at the National Child Protection Training Center on the Winona State University campus in Minnesota.

## College of Science

**Laszlo Baksay** was invited to become a member of the scientific board of UNESCO's International Basic



Laszlo Baksay

Sciences Program. He will attend the fifth meeting of the board in June at UNESCO's Paris headquarters.

**Hakeem Oluseyi** presented an invited lecture at the Brevard Astronomical Society's Astronomy Day at Brevard Community College in May.

**Virender Sharma** organized a symposium titled "Speciation and kinetics in natural waters" at the American Chemical Society national meeting in Salt Lake City, Utah.

**Niescja Turner**, **Susan Earles** and doctoral candidate **Doug Cramer** published "Geoefficiency and energy partitioning in CIR-driven and CME-driven storms" in the *Journal of Atmospheric and Solar-Terrestrial Research*.

**Matt Wood**, who spent the 2008–2009 academic year on sabbatical at Radboud University in Nijmegen, the Netherlands, published a paper on light curves of binary systems in the *Monthly Notices of the Royal Astronomical Society*. Another paper he wrote for that publication, on negative superhumps, is currently in press.

### Colleges of Engineering and Science

The following faculty members and graduate student presented at the 73rd annual meeting of the Florida Academy of Sciences:

**Marcus Hohlmann and Debasis Mitra**: “Performance comparison of the triple-gas electron multiplier (GEM) and the drift tube muon detectors used for muon tomography” and “QuarkNet and cosmic ray muon flux experiments.”

**Elizabeth Irlandi**: “A comparison of metal concentrations among stormwater ponds influenced by different types of land management.”

Graduate student **Matt Merlo** and **Eric Perlman** presented “Mid-infrared spectroscopic observations of Cygnus.”

**Geoffrey Swain and Kevin Johnson**: “An examination of possible planktonic vs. benthic sources of nematodes colonizing the biofouling community in the Indian River Lagoon, Florida.”

**John Trefry and Robert Trocine**: “Reassessment of the distribution of fine-grained, organic-rich sediment (A.K.A. muck) in the Indian River Lagoon, Florida.”

**Ralph Turingan and Junda Lin**: “Phase-shift in coral reef communities in the Florida Keys National Marine Sanctuary, USA.” Turingan, with **Dick Turner**, also presented “Brittlestars with a bite: a new kind of pedicellaria in echinoderms” at the meeting.

### Athletics

**Adam Thorstad**, head women’s rowing coach, won Coach of the Year honors for the second time in four years from the Sunshine State Conference.



*Adam Thorstad*

**The July 4 holiday is on July 3.**

### Sponsored Scholars

Florida Tech sponsors a Young Adult of the Month Award at each Melbourne-Palm Bay Chamber of Commerce monthly breakfast. In May, Kaylie Smith of Satellite High School and Andrew Schwartz of Melbourne Central Catholic High School were honored. They will each receive Florida Tech scholarships if they choose to attend the university.



*Pictured with the winning students is Wes Sumner, associate vice president for university relations.*

### May MVP



The May Most Valuable Panther was **Mike Perry**, director of undergraduate admission. Congratulations, Mike!

To nominate a staff or faculty member for this award, send your letters to MVP Committee Chair **Leslie Savoie** at [lsavoie@fit.edu](mailto:lsavoie@fit.edu).

### First Phi Kappa Phi Chapter Starts at University

In May, Florida Tech held its charter installation and initiation ceremonies for the Honor Society of Phi Kappa Phi.

“We are honored and excited to have Phi Kappa Phi on campus and to begin this tradition of recognizing academic excellence at Florida Tech,” said **Randy Alford**, Graduate and International Programs.

Alford was installed as chapter president at the ceremonies. Also installed were **Mary Bonhomme**, vice president; **Deborah Marino**, secretary; **John Trefry**, treasurer; and **Bob Taylor**, public relations officer.

Additionally, eight faculty and staff members and 194 students were initiated. The faculty members are **Ray Bonhomme**, **Steve Lazarus**, **Mary Beth Kenkel**, **Mary Helen McCay**, **Nathan Miller**, **Rick Tankersley**, **Kurt Winkelmann** and **Cookie Young**.

President **Anthony J. Catanese**, who spoke at the ceremonies, said “The chapter is a prestigious addition to the academic life of Florida Tech. We are in very good company as we join the ranks of many top universities.”

The society’s mission is “to recognize and promote academic excellence in all fields of higher education and to engage the community of scholars in service to others.”



## Fish Poisoning and Polynesian Voyaging

Ciguatera poisoning, the food-borne disease that can come from eating large, carnivorous reef fish, causes vomiting, headaches and a burning sensation upon contact with cold surfaces. The common toxin may be the key to a major mystery. That is, the storied migrations of the Polynesian natives who colonized New Zealand, Easter Island and, possibly, Hawaii in the 11th to 15th centuries.

A Cook Island Maori from Rarotonga **Teina Rongo**, a Florida Tech doctoral student, and his faculty advisers **Robert van Woesik** and **Mark Bush**, Department of Biological Sciences, propose this intriguing theory in the *Journal of Biogeography*. They theorize that climate-linked ciguatera outbreaks prompted historical migrations of Polynesians.

It is known that this population was heavily reliant on fish as a source of protein, and the scientists suggest that once their fish resources became inedible, voyaging became a necessity.

A story about their paper has been featured in *Medical News Today* and *Science Daily*. Also, the professors have been interviewed for stories in *Nature*, by Radio Australia and for the American Association for the Advancement of Science. The paper is available at [www.wiley.com/bw/journal.asp?ref=0305-0270](http://www.wiley.com/bw/journal.asp?ref=0305-0270).

## Baarmand Earns \$465,000 Grant for Research

**Marc Baarmand**, physics and space sciences, received a \$465,000 grant from the U.S. Department of Energy (DOE). The grant, which supports his research in elementary particle physics and the origin of mass, is in addition to more than \$1.1 million that the DOE has previously funded him for Florida Tech work on the Compact Muon Solenoid (CMS) project. The project is located at the European Center for Particle Physics (CERN) in Geneva, Switzerland. The center was depicted in the recent film, *Angels and Demons*.

After more than a decade of construction and commissioning, the CMS experiment will start processing data later this fall when the Large Hadron Collider, a proton accelerator, starts its operation producing proton-proton collisions at the highest-ever energies. Baarmand, research scientist **Igor Vodopriyanov** and graduate students **Hamit Mermerkaya** and **Mike Ralich** are preparing for data analysis.

## From the President's Desk



Anthony James Catanese

Summer is in full swing at Florida Tech, but the hard work continues! In addition to the many summer camps, classes and research activities, construction is going up even as the summer sun beats down. I want to share an update on three key work sites that you likely pass every day as you travel the campus:

**Harris Center for Science and Engineering**—As you may know, this building will be 29,000 square feet in three stories. The first floor is a replacement of biology space that will be demolished as a result of the new parking garage that is planned at what we call Simcox Square. The second floor will house the department of computer sciences as well as the Global Center for Climate Change. On the third floor will be the Harris Institute for Assured Information. The construction continues as the roof and mechanical penthouse structural steel is installed and the masonry is finalized. Duct work and framing follow starting with the first floor. Completion remains scheduled for late summer.

**Scott Center for Autism Research**—Construction is ongoing for this 22,000-square-foot, two-story facility. This building is designed to meet “Silver Certification” in the Leadership in Energy and Environmental Design (LEED) Green Building Rating System. The roof sub-structure has been installed and both mechanical (HVAC) and electrical work is well under way. Occupancy is expected in August.

**Ruth Funk Center for Textile Arts**—Construction of the roof is complete. Interior framing, ductwork and electrical wiring is well under way. The aluminum framing for the windows and storefront system is ongoing. The HVAC chilled water lines and pump have been installed and the air handlers are on the roof. Planned completion is expected later this month with the public grand opening at 10 a.m. on Aug. 29.

These bricks and mortar enhancements that you see every day (with many more in the planning stages) are an inspiring sight on campus. While I firmly believe it is our people—faculty, staff and students—who are the heart of this very special place, we must give them adequate tools to innovate and inspire. These three new projects are wonderful examples of the bright future that faces our Florida Tech family as we look forward to the next 50 years.



**Florida Institute of Technology**  
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Campus Observer is published by the Office of University Communications  
 Sr. Vice President for Advancement . . . . . Kenneth Stackpoole  
 Associate Vice President for University Relations . . . . . Wes Summer  
 Editor . . . . . Karen Rhine  
 Design and Layout . . . . . Office of Creative Services  
 Photography . . . . . Sam Durrance, Kathy Hagood, Anthony James,  
 Verna Layman, Lisa Rouede, Niescja Turner