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DENTISTRY • MEDICINE • NURSING • PHARMACY • PUBLIC HEALTH AND HEALTH PROFESSIONS • VETERINARY MEDICINE
A new cancer killer

Paul Okunieff, M.D., chair of the UF department of radiation oncology and director of the UF Shands Cancer Center, explains the new Intrabeam system to a crowd gathered after a Nov. 12 ribbon-cutting ceremony celebrating the arrival of this latest treatment available at Shands at UF. The Intrabeam system is an intraoperative radiation technology available at fewer than 20 treatment centers nationwide. The system is the only one in the state of Florida. This new treatment dramatically shortens radiation therapy for early stage breast cancer patients, reducing treatments from traditionally three to six weeks to approximately 25 minutes during the surgical procedure.
SPOTLIGHT ON UF

The national spotlight is on UF’s Institute on Aging/ Clinical and Translational Research Building complex, which will be completed in 2013. The project is featured in the latest issue of a National Institutes of Health publication describing the impact of American Recovery and Reinvestment Act grants. National Center for Research Resources funds will cover construction of an almost 40,000-square-foot research facility for the institute, while UF will fund the adjoining 80,000-square-foot building that will be home to the Clinical and Translational Science Institute, the Clinical Research Center, biomedical informatics and a geriatric medicine multispecialty clinic.

WHAT’S YOUR PROMISE?

Starting in January, you may start seeing a little bit more of this guy. The Health Science Center and Shands HealthCare have teamed up to launch an initiative highlighting patient safety and the patient experience. Want to learn more? Attend the “I Promise” kickoff event at noon Jan. 19 in the Shands at UF Atrium.

A CENTER ON THE RISE

The Shands at UF Lung Transplant Center was one of three lung transplant centers in the U.S. to receive the Lung Transplant Excellence Award from the independent rating organization HealthGrades. The agency evaluated 210 hospitals for honors in kidney, lung, heart and liver transplantation. The awards were based on three-year survival rates and mortality rates.

SNAZZY COVER, COOL CAUSE

Still need a stocking stuffer? Or maybe just something fancy to show off your Gator spirit? Then check out the phone and iPod Coveroo cases on sale at shandsgiving.org. A variety of styles are available, including some FSU cases for your less cool friends. Each purchase generates a 15 percent donation to the Children’s Miracle Network at Shands at UF.

Visit us online @ http://post.health.ufl.edu for the latest news and HSC events.
Meet your future surgeon
Physician shadowing class gives pre-med students an inside look at medicine

By Laura Mize

Standing in an operating room at Shands Hospital, Fred Bien-Aime feels one step closer to his dream of becoming a surgeon.

He watches in amazement as UF surgeons remove a patient’s cancer-ridden esophagus and fashion a new one from the patient’s stomach. He’s just a few feet away from the medical team, watching the complicated procedure unfold.

Throughout the seven-hour operation, the surgeons sometimes take a moment to tell Bien-Aime what they are doing and why. Sometimes he asks questions. Mostly, he just stands and watches, fascinated.

“I want to be a surgeon more,” Bien-Aime said after the surgery.

Not every undergraduate student at UF gets to watch an operation take place. Bien-Aime, a sophomore majoring in biochemistry, is enrolled in a College of Medicine course called Physician Shadowing.

Students who receive an ‘A’ in the prerequisite course may enroll in the class and are assigned to shadow a faculty member from the college.

Bien-Aime has spent the semester shadowing Kfir Ben-David, M.D., an assistant professor of surgery and director of bariatric surgery at UF. Bien-Aime has followed Ben-David as he visits patients in the clinic and watched several surgeries in the OR.

He said he enjoys seeing Ben-David interact with patients, and he appreciates all the work, care and concentration that go into a surgery. To him, it seems like the perfect career.

“I want something that’s going to keep me interested, something that makes me think a lot but really gives me the satisfaction when I’m done with it,” Bien-Aime said. “With surgery, it’s an instant gratification. Either I did it, or I didn’t. I live for that.”

Ben-David, who has been a physician mentor through the course for about three years, said he sees his involvement as a way to give back to his alma mater.

“If I am able to positively influence these undergraduate students to go to medical school, I think I’ve done well,” he said.

Bien-Aime first dreamed of becoming a physician as a child, when his parents suggested it. The idea stuck with him. But when Bien-Aime was 9, his father died of brain cancer.

“I couldn’t cope with the fact (that he had died),” he said. “I thought my dad was a good man, and I didn’t understand.”

He struggled in school and didn’t get along with his mother.

“A lot of stuff was going wrong in my life,” he explained.

Eventually Bien-Aime began attending church and reading the Bible. He said his newfound faith helped him get serious about academics and his future. His father’s death became a motivation for helping others.

“Going back over my life, what happened to my dad, I was like ‘You know, I want to be that … doctor (who) was with my dad before he died,’” Bien-Aime said.

“I would hope that he put his all into trying to help him, and I want to be that for someone else.”

Bien-Aime enrolled in a pre-health magnet program in high school, where he learned basic anatomy and earned several entry-level health certifications.

Today, he focuses on finishing college so he can attend medical school.

“Being a pre-med student, it’s hard,” he said. “You’re really got to be focused and determined that this is really what you really want, something that you really desire in your heart.”
Sometimes, even teachers need a field trip, and Mini Medical School has been giving educators that hands-on, face-to-face experience for 10 years.

A decade ago, it was difficult to get teachers to attend, said Julie Bokor, who coordinates UF’s Mini Medical School. But the enrollment for the Nov. 15 event included about 90 teachers from 22 counties.

As part of Mini Medical School, teachers spend the day touring labs across the Health Science Center and listening to physicians and scientists during university-style lectures.

This allows the middle and high school teachers to learn about the latest medical developments firsthand instead of from a textbook or journal.

“I like how down to earth and excited the researchers are about what they’re doing and (how they) want to tell you about it,” said Cheri Dennen, a biology teacher from North Port High School in Sarasota County and a two-time Mini Medical School participant. “The excitement is very motivational to see.”

The annual one-day in-service opportunity is coordinated by the UF Center for Precollegiate Education and Training with funding provided by the UF Medical Guild and Shands HealthCare.

This year’s focus was psychiatry and included topics such as addiction, obesity and personality disorders. Health science teacher Trish Shimer from Titusville High School will use examples from her lab visit about obsessive-compulsive disorder in her upcoming lesson on mental disorders. Shimer has taken part in the program seven times and looks forward to attending every year.

“I appreciate CPET doing this for us because it provides us with so much information on new technology and new research to take back to kids to get them fired up and interested,” Shimer said.

By Bridget Higginbotham

The Commission on Collegiate Nursing Education has formally accredited the Malcom Randall Veterans Affairs Medical Center’s postbaccalaureate nurse residency program — a part of a formalized VA-UF College of Nursing partnership program. This makes it one of only three formally accredited nurse residencies in the country and the first-ever nurse residency accredited at a VA facility.

The postbaccalaureate nurse residency is a yearlong program that pairs new Bachelor of Science in Nursing degree graduates with preceptors and mentors. They experience extensive orientation and training throughout the year. The goal is to provide a structured transition experience from new graduate to professional nurse.

“Our college is a proud partner with the VA on several educational initiatives, and we are especially proud of the success of the nurse residency program in achieving national accreditation,” said Kathleen Ann Long, Ph.D., R.N., dean of the UF College of Nursing. “High turnover rates for new nurses are a national problem and not only result in increased hospital costs but also compromise patient safety and the quality of care. Postbaccalaureate nurse residency programs, such as the one at our VA hospital, address these problems effectively.”

As part of the national VA Nursing Academy, the VA-UF nursing partnership addresses expanding enrollment of nursing students, increasing faculty and enhancing nursing practice through initiatives such as the nurse residency.

The VA nurse residency program has improved the one-year retention of newly graduated nurses at the Malcom Randall VA from 69 percent in 2007 to an average of 91 percent.

“This residency allows us to orient nurses at a slower pace that facilitates application of assessment and communication as well as priority-setting and decision-making skills,” said Julia Tortorice, M.B.A, M.S.N., the VA residency program director.

By Tracy Brown Wright

Nurse residency program receives national accreditation

The first class of VA-UF nursing residents started in 2007.
Although the holidays will be tough this year for the Palmer family of Gainesville, they are grateful for what they call their “little survival miracle” — a toy rat terrier, Bindi, whose presence gives them much to be thankful for.

“At the beginning of October, I lost my 22-year-old son in a horrible event that will take me a long time to get over,” said Elizabeth Palmer, who works as a network administrator for UF’s Enterprise Systems, which provides technology services to the UF community. “About three weeks after his passing, another family member and I forgot to check on Bindi’s location when I left for work. It turns out that she had been left with our larger dogs instead of with her half sister, Sarah. When my 14- and 16-year-old daughters came home from school, they found Bindi in a bloody mess and barely alive.”

Palmer took the dog to her local veterinarian, who advised her to take Bindi to the UF Small Animal Hospital because of the severity of her injuries.

When the family arrived at UF, Bindi was immediately taken back to the emergency area and assessed.

“The doctors came out and described what they had done and all the care and surgeries that would be needed in hopes of keeping her alive,” Palmer said. “They estimated the cost, which was a burden on our family, but we immediately agreed. We were willing to spend whatever we could to keep her alive.”

The family visited Bindi every day. At first, it seemed doubtful she would survive.

Bindi was given blood transfusions and underwent several surgeries. During one procedure, Bindi nearly lost her life and had to be resuscitated. Slowly, however, she continued to improve.

“It seemed like every other day she had another surgery, but in just a couple of weeks, she was ready to go home, with only one wound still left to close,” Palmer said. “She is our little survival miracle.”

After she was discharged from UF, Palmer wanted to keep a close eye on her pet, and it was convenient to drive across campus with Bindi for additional treatments.

“Bindi brings a smile to everyone’s face,” Palmer said. “She has become a brand new dog.”

Palmer said her son, Charlie, was an animal lover and had loved all of the family dogs. He also had a puppy of his own, she said.

“Charlie’s death has forever changed my life,” Palmer said. “It would have been unbearable to have lost Bindi, too. We very much needed this happy ending right now.”
“His doll is really naked,” proclaimed 4-year-old Ainsley Sisk as she kissed its cloth head and plopped down on the floor of the Shands Cancer Resource Center to dig through doll clothes.

After she dressed the doll in a pink shirt and black, checkered pants and gave it a face and hair, Ainsley added it to a box with 25 others to be sent to an orphanage in the Guangdong Province of China.

Hundreds of handmade dolls and stuffed animals have been gifted to children around the world thanks to Dollies Without Borders, a project started by Shands artist-in-residence Madeline Austin.

Dollies Without Borders has been making and sending dolls to countries such as Rwanda, Thailand, Haiti and Peru since 2006, but Nov. 13 was the first time it hosted a give-a-doll, get-a-doll event. Ainsley and other members of the group Families With Children from Asia each made two dolls, one to send and one to keep. Held during National Adoption Month, it was an opportunity for families to help the children still in orphanages in Asia.

“So many kids are still there and they have nothing,” said Amelia Connors, who adopted her daughter Amanda, 7, from Jiangxi, China, five-and-a-half years ago. “They don’t have dollies to play with. They play with their hands.”

It was children in Tanzania with nothing who inspired Dollies Without Borders. While working there as a visiting artist, Austin noticed that the only thing the children had to play with was one broken plastic white doll. She had been a doll maker all her life and became determined to makes dolls for children that reflected their culture and ethnicity. These dolls have been hand-delivered around the world. The Center for the Arts in Healthcare Research & Education annually takes dolls and doll kits to Rwanda.

“I really want to make dolls for as many children in developing countries as I can,” she said.

Every month, children, undergraduates, medical students and community members attend Austin’s doll-making workshops. Like an old-fashioned sewing circle, each “dolly mama” works on a doll from beginning to end — no assembly lines here.

Austin encourages people of all ages to hug the dolls and tell them stories so they’ll be full of love when children receive them. Before the dolls are delivered abroad by traveling members of UF and Shands, she brings the dolls to hospital patients to bless first.

Jennifer Paugh-Miller, P.A.-C, heard about Austin’s project while working in the dialysis unit and thought it would be a great activity for Families with Children from Asia. The organization’s members have adopted children from China, Taiwan, Vietnam and Korea, and meet monthly to socialize and celebrate Asian culture.

Paugh-Miller’s mother, Vickie, sewed the 60 doll bodies and outfits for the event. She started in August and finished the week of the event, which was held the day before the anniversary of her granddaughter’s adoption.

Austin is usually the one to prepare the dolls for workshops. She never charges people to participate; money and donations always come right before her materials run out.

“It all seems to just work out,” Austin said. “Life is like that.”
Shining a blue light on diabetes

By Elizabeth Behrman

It was all bubbles, bells and blue lights at the Century Tower Lighting Ceremony on Nov. 12.

Century Tower was done up in blue in recognition of World Diabetes Day and as part of Diabetes Awareness Month. The tower remained lit until the following Monday morning.

Organizers and contributors from the American Diabetes Association, the Juvenile Diabetes Research Foundation and the UF Diabetes Center of Excellence told their stories and commended researchers and families for their hard work in searching for a cure for the disease, which affects millions of Americans.

After the speeches, the crowd of more than 60 people formed a circle at the base of the tower, and as the blue light washed over the bricks, bubbles were blown up to the top as symbols of the 284 million people living with diabetes worldwide.

Tracy Milligan, an American Diabetes Association advocate from Jacksonville, said her son was diagnosed with type 1 diabetes when he was 4, so she understands the struggles people go through with the disease. Her son has been discriminated against because of his diabetes, one of the reasons she got involved with the ADA, she said.

“I extend my hand in asking you to help educate people and advocate for those with diabetes,” she said.

And the winning chomp is . . .

By April Frawley Birdwell

They say it takes a true Gator to know how to chomp.

With handmade orange and blue shirts and some sassy dance moves, the girls from the Girls Place in Gainesville chomped to win in Shands at UF’s recent Chompetition, which asked people to make videos set to the song “Do the Chomp.”

The chompetition may have been fierce, but the Girls Place team managed to snag the top prize — a trip to the final UF home game Nov. 20 and a chance to see their video on the Jumbotron — with a little help from some friends in the UF College of Nursing.

A group of UF nursing students came up with the idea as a fun activity that also would allow the girls to work together to plan and collaborate on a project.

“It really challenged them to use teamwork to design this creative video,” said Courtney Yamber, a B.S.N. student in the College of Nursing. “All the girls chipped in and really made this their project. As we filmed, it was wonderful to see each girl’s confidence rise.”

The nursing students helped the girls choreograph, edit and submit the video with the guidance of their instructor Cathy Levonian, Ph.D., R.N., a clinical assistant professor in community health nursing.

“The staff and directors of Girls Place are most grateful to UF nursing professor Cathy Levonian and her students for choreographing and filming the video,” said Renae Clements, Girls Place executive director. “The project was a healthy exercise for the girls.”

To see the winning video, visit shands.org/chomp. To view all the Chompetition video entries, visit youtube.com and type “Shands Chomp 2010” in the search field. Another Chompetition is in the works for basketball season.
Having traded in his No. 39 jersey for scrubs, Joey Sorrentino, 24, watched most of this season’s football games from the library instead of from the field.

A year ago he was a captain of the top team in the country and a member of the winningest senior class in Southeastern Conference history. Now, Sorrentino is just another first-year dental student studying to keep his grades up and options open.

“Being a smaller guy, most people laugh when they hear I play football, ‘There’s no way,’” Sorrentino said. “Which is fine with me. I’ve always enjoyed the unassuming underdog role.”

But this underdog is no underachiever. The 5-foot-7-inch walk-on earned a scholarship position on special teams and played in 42 games, including two national championships.

“Joey earned everyone’s respect,” said James Smith, a former teammate. “Honestly, he outworked everyone on the team. Pound for pound, he was the strongest guy on the team.”

Sorrentino said that balancing football and academics as well as dealing with the pressure of coaches and fans prepared him for the grind of dental school.

“The four years I played football I had never been so overly stressed in my entire life — mentally, physically and emotionally,” he said. “It just wears on you, and it helps you as a growing person to deal with all the pressure.”

Sorrentino always knew he wanted to go into health care — his mother, a nurse, and father, a pharmacist, own a medical research company and met while working at Shands.

Shadowing a friend’s father last year inspired Sorrentino to become a dentist. The number of people who couldn’t afford necessary treatment touched him. Someday, he hopes to open clinics back home in Ocala with his brother Dante, a Florida International University medical student.

“The community there has given so much to me and dentistry is one way to allow me to give back,” Sorrentino said. “Also, it seemed like a great profession for having a family. I’m a big family guy.”

Staying in Gainesville, Sorrentino has been able to stay close to his youngest siblings: athletic sister Rachel, 14, and musical brother Anthony, 16. As a toddler, Anthony had liver cancer.

“At the time it was an awful thing but it definitely brought our family closer,” Sorrentino said. “It makes you appreciate things, really put it in perspective.”

Remembering what it was like for Anthony during treatment, Sorrentino used his $500 Best Buy gift card from the 2008 Capital One Bowl to purchase a Wii console, video games, a DVD player and DVDs for a children’s hospital.

Sorrentino paid visits to hospitals and camps through the Climb for Cancer Foundation and Goodwill Gators with his teammates. In 2009, he captained the American Cancer Society team during the Gators Strongman Charity Challenge, where the team showed off their summer training for fans.

While dentistry is Sorrentino’s priority, he still finds a little time to play intramural football. He jokes with the Gators’ head trainer about possibly becoming the team’s dentist. It would be a way to give back to the program that gave him so many opportunities.

“I’ve been so blessed, so fortunate with football and really in all aspects in my life,” he said. “I’m very fortunate. I don’t know how else to put it.”
A look back at some of the photos you didn’t see this year

After 39 years at UF, Tom Harris retired from his position as associate vice president for administration in June.

Lynette Chance, 8, stops to read the September issue of The POST during a Shands Arts in Medicine Dollies Without Borders workshop in the Shands Cancer Resource Center.
Dr. Micaela Gibbs and Dr. Scott Tomar of the UF College of Dentistry apply dental sealant to Kinn’zon Hutchinson’s teeth in October. The college teamed with United Way of North Central Florida, Oral Health America, Alachua County Public Schools, the Alachua County Health Department and Plackers to begin a program to apply sealant to the teeth of second-graders and provide fluoride gel to preschool children in Head Start programs.

This summer, employees of UF and Shands took a chomp out of TV. Shands HealthCare hired an ad agency to film a commercial featuring employees across Shands and the HSC.
About eight years ago, when he was living in Chicago and working at Loyola University, John Lednicky, Ph.D., created an ecosystem. In his basement.

“I was trying to get a grant for the conservation of the world’s smallest fish in the Philippines, and I converted the whole basement,” says Lednicky, now a professor of environmental and global health in the College of Public Health and Health Professions. “I had everything you can think of: I was growing algae, worms, rotifers, paramecium, mysid shrimp … my wife hated it, but my kids loved it.”

The fish didn’t pan out — their habitats in the Philippines were polluted and the fish could not be found — but Lednicky made another discovery in his basement ecosystem; He learned how to grow algae loaded with a type of nutritious oil that fish thrived on. As it turns out, the oil is also good for other products, namely biodiesel. While working in Kansas City, Lednicky turned his side project into a way to efficiently produce biodiesel by cultivating and purifying oil from algae.

“Do you have any idea how much oil you can squeeze out of corn? If you have a field in lab conditions and no bugs, perfect lighting and good water, you can get maybe 300 gallons an acre,” Lednicky says. “If you dedicated an acre to algae cultivation, you could get 15,000 to 50,000 gallons an acre.”

Of course it’s not that simple, Lednicky explains. Cultivating algae to produce oil requires expensive bioreactors, which keeps the organism in perfect conditions. Lednicky came up with a way to improve the oil yields by growing algae in complete darkness.

Aside from making biodiesel, the algae can be used to absorb carbon dioxide from coal plants and to make nutritious food products for developing countries. Lednicky has produced alga oil with a chemical make-up he compares to olive oil, although it tastes a bit more like grass, he admits.

What does this have to do with his lab at UF? Not a lot. He studies avian flu and is leading the development of an aerobiology lab in the college. But he hopes he can generate interest in cultivating algae at UF.

“Health is a multibillion-dollar industry. Energy is a multitrillion-dollar industry,” Lednicky says. “You can imagine if something like this became an economic viability, the importance to the state and UF are high. That, in turn, can support any of our health initiatives, as well. I am still very enthusiastic about this. I hope something comes out of it.”
Lessons from Mother Goose

In jumping and tumbling we spend the whole day,  
Till night by arriving has finished our play.  
What then?  
One and all, no more to be said.  
As we tumbled all day,  
So we tumble to bed.

If you’ve ever recited a nursery rhyme to a cooing infant, chances are you didn’t think about how the rhythm of the words affected the baby’s heart rate. But when spoken regularly by mom, something as simple as a familiar rhyme can have a powerful effect on a developing fetus or premature infant, says Charlene Krueger, Ph.D., an associate professor in the College of Nursing.

A former labor and delivery nurse at Shands at UF, Krueger measures how babies between 28 and 34 weeks’ gestation respond to their mothers’ voices. In one project funded by the National Science Foundation, she’s studying specifically whether babies can learn a familiar nursery rhyme while in utero. She also is studying whether preemies in the neonatal intensive care unit respond to the rhyme.

“If mothers recite the nursery rhyme, by 34 weeks the fetus will respond with a small heart rate deceleration, which I consider to be a cardiac orienting response,” Krueger says. “They learn the rhythm of the nursery rhyme. We play it with a stranger saying it as well and they respond to it the same way.”

Krueger also is studying how regular exposure to their mothers’ voices can help premature infants thrive in the NICU.

“When a mother talks, not only does her baby hear her, her vertebral column vibrates and, her diaphragm rocks the baby in sync with her speech,” Krueger says. “That is why my research is centered around mom’s voice. It is a unique source of sensory stimulation for the fetus at a time when their auditory nervous system is maturing, which is largely lost in the NICU. I believe, for preterm infants, a mother’s voice is a source of stimulation that is potentially important to continue during care.”

Journey to the center of your DNA

As a postdoctoral assistant in the early 1990s, Laurence Morel, Ph.D., began looking for genes associated with the autoimmune disease lupus. She thought she would find a gene and that would be it, mystery solved.

But like almost all research questions, finding genes led to more mysteries and more problems to solve, says Morel, now a professor and director of experimental pathology in the College of Medicine.

“My dad, who is not a scientist, used to ask me, ‘Have you found what you are looking for?’ It’s not something you find and move on. It’s a continuous pursuit.”

Lupus is particularly complex, says Morel, whose lab is focused on identifying genes associated with the disease in a mouse model she produced. Because many genes are associated with lupus, there is no one-size-fits-all answer to help patients, and scientists still have a lot to figure out, namely uncovering all of the genes involved and how each affects the immune system.

“Our goal is to ultimately understand the disease better and identify new targets for treatment,” Morel says.
If eyes are the windows to your soul, your mouth might be the window to your health.

“If you think about it, your oral cavity is a gateway for everything,” says Shannon Wallet, Ph.D., an immunologist and assistant professor in the College of Dentistry. “It is a specialized compartment that has to deal with a lot of insults, and if it does not deal properly with those insults, it directly affects everything else that happens in your body.”

To better understand the relationship between problems in the mouth and overall health, Wallet teamed with periodontist Luciana Shaddox, D.D.S., Ph.D., after coming to UF four years ago.

Together, they are working on two major projects, one of which involves treating a group of children in Tallahassee who have an aggressive form of periodontitis. Caused by bacteria that stick to teeth under the surface of the gums, periodontitis can lead to bone loss, gum inflammation and ultimately, loss of teeth. It's typically seen in adults, says Shaddox, an assistant professor in the College of Dentistry. These children have a rare and aggressive form of periodontitis that scientists don't know much about.

“Our goal is to find out not only what bugs are involved but also the immunological mechanisms at work and the systemic immune response,” Shaddox says. “Right now we target the bugs, but if we find other mechanisms play a big role maybe we can add something else to it.”

The researchers are also looking at the relationship between diabetes and periodontitis. They hope to find out how treating the disease in the mouth can affect a patient’s overall health and control of his or her diabetes.

“A lot of treatments are so invasive,” Wallet says. “If we can fix it in the oral cavity than maybe we can bypass the complications of treatment.”

No one said decoding a language would be easy. Especially when it involves microscopic worms, specifically parasitic nematodes that communicate via complex chemical signals.

Understanding how parasites parley could help scientists combat organisms that affect human health, one of the reasons why researcher Art Edison, Ph.D., and his lab are busy trying to unravel the language.

“We think there is a universal language,” says Edison, a professor of biochemistry and molecular biology in the College of Medicine. “This is really preliminary, but we think they all communicate with the same category of pheromone. It is neat biology, and I think it could lead to a promising direction in human health.”

Of course the interesting question is not why, but how? Edison’s lab is focused on a type of technology known as nuclear magnetic resonance spectroscopy. NMR, which involves placing a sample into a magnet, gives scientist an atom-by-atom chemical portrait of a substance.

Edison and his team developed a probe that heightened the sensitivity of the technology, allowing researchers to examine super small samples of compounds, such as nematode pheromones, for example. The group collaborates with the National High Magnetic Field Laboratory.

They are currently developing another probe that will allow for better detection of carbon atoms, important because carbon is the key chemical player in the makeup of most organic substances.

“Sometimes, for natural products, it can take months to years to get enough sample to test. This technology allows us to look at low concentrations, making it much more efficient,” he says. “Our devices are 20 times more sensitive than conventional technology.”
When parents ask a physician what to expect after a child undergoes a kidney transplant, it can be difficult for doctors to give answers based on research. “In children’s research, we often have to extrapolate from adult research and hope it applies to children,” says Vikas Dharnidharka, M.D., division chief of nephrology in the College of Medicine department of pediatrics. “Sometimes they don’t apply, so it is better if we can make sure what we are doing is valid.” Simply put, kids are not adults. As a pediatric nephrologist, Dharnidharka is involved in numerous clinical research projects, including developing a panel of tests to help predict infection and rejection after transplants. But he is also involved in larger-scale epidemiological projects to try to get better answers about post-transplant outcomes. Specifically, he is looking at risk factors for a type of lymphoma that occurs in patients who have undergone a transplant. The problem occurs because patients are on high doses of immunosuppressive drugs to keep the body from rejecting the new organ. The drugs work so well they keep the body from fighting off the cancer. “All organ transplant recipients are at risk,” he says. “In adults, the risk is seven- to 10-fold. In children, it is 200-fold.”

Inside your eye, there’s a place where water flows like a river, through the lens and cornea. It flows in and out, keeping the parts of your eye in working order. But if debris builds up, a little dam is formed in a part of the eye where this water flows, called the trabecular meshwork. If the dam grows, the fluid builds, causing pressure to rise inside the eye. “If this pressure is too high it causes glaucoma,” says Dorette Ellis, Ph.D., an assistant professor of pharmacodynamics in the UF College of Pharmacy. “Pressure kills nerves at the back of the eye. Millions of people go blind because of glaucoma. What I try to do in my lab is figure out how to make the dam break so water can flow through.”

Using donated human eyes, Ellis studies how different drugs affect the flow of water through the trabecular meshwork and another part of the eye called the Schlemm’s canal. Because these parts of the eye are different in humans and animals, getting samples from human eyes in key but can be a challenge. “We are one of three labs in the world that has the capacity to culture cells from the Schlemm’s canal,” she said.
For years, Shands at UF nurses have used quick-reference pocket guides when caring for patients at the bedside. Now, there’s an app for that.

Two Shands at UF nurses, in collaboration with the Shands HealthCare Center for Nursing Innovation, have created an application for the iPhone and iPad called Post-Operative Pediatric Congenital Cardiac Care. It serves as a digitized reference guide — with evidence-based data culled from multiple references — for pediatric critical care nurses.

“We wanted to take a new approach to our pocket references that would provide instant access to patient care information,” said Lynn Westoff, B.S.N., R.N., Shands at UF Surgical Intensive Care Unit clinical leader and a co-creator of the app. “Many of our nurses use smartphones, so we wanted to capitalize on that technology to create an innovative, easy-to-use electronic reference.”

Westhoff brainstormed ideas for the app with Michael Maymi, B.S.N., R.N., C.C.R.N., a Shands Children’s Hospital Pediatric Intensive Care clinical leader. They presented a business proposal to the Center for Nursing Innovations team: Rose Rivers, Ph.D., R.N., Shands HealthCare chief nursing officer; Ginger Pesata, M.S.N., A.R.N.P., Shands at UF Nursing professional development administrative director; and Jonathon (Tre) Dixon, Shands Jacksonville senior attorney. The team hired a software company to design the app. Westhoff and Maymi provided the content and the illustrations.

The app will be available for download this month for $9.99 from the Apple store, and will eventually be available for the Droid. Maymi and Westhoff hope it is the first of many Shands-branded smartphone applications.

“We are encouraging our colleagues to step forward if they have any ideas for applications,” Maymi said. “So bring us your apps! We are very fortunate that we work at a place where our ideas can be realized.”

Encrypt it

Get a new flash drive and keep information secure ... for free

In December 2009, the protected health information of nearly 84,000 patients in Canada was breached in one quick instant — when a USB flash drive was lost.

To prevent this kind of incident at UF and Shands, the information technology department is offering new encrypted flash drives to UF Health Science Center and Shands HealthCare employees from 9 a.m. to noon Jan. 19 in the Shands at UF Atrium.

To receive one of the encrypted flash drives, employees must bring an old flash drive to trade in and must have either their Gator 1 Card or Shands ID on hand. The used flash drive will be destroyed after it is turned in.

For more information about the trade-in event, please visit https://security.health.ufl.edu/usbtradein/.

— April Frawley Birdwell
Universities team up on projects to help the state
By Czerne M. Reid

UF and the Florida State University College of Medicine have received $600,000 from the Board of Governors of the State University System of Florida to strengthen research, education and service efforts in public health and to boost economic growth.

The award, under the 2010 New Florida Initiative Scholar's Clustering Grant Program, aims to foster collaborations among state institutions in the areas of health, science and engineering. It is part of a broader program to engage the state university system in the creation of high-skill, high-wage, knowledge-based employment opportunities.

The project is just one of seven to receive New Florida funds at UF, which received $2.5 million in all.

The funds will support the UF-FSU Community Research Collaborative Program, a research effort that combines UF's expertise in clinical and translational science research with FSU's strength in community-based medical education.

"Working together, the universities will create new opportunities and advances not only for physicians, scientists and students, but most importantly, for the citizens of Florida, as we explore patient-oriented research into the causes, prevention, diagnosis and treatment of diseases," said David Nelson, M.D., director of the UF Clinical and Translational Science Institute and co-principal investigator of the project.

The project will establish a statewide network of facilities affiliated with the two universities that will connect local communities with teams of clinical scientists, physicians and physicians-in-training, creating new opportunities to conduct clinical and public health research.

Initial efforts will involve the assessment and monitoring of mild traumatic brain injury and of health risk behaviors among youngsters in Florida.

The project will give physicians and medical students access to state-of-the-art instruments that will allow surveillance, detection and follow-up of mild traumatic brain injury cases among youth who take part in organized sports.

It will also involve collaborating with pediatricians and family practice physicians to evaluate practices already in use for assessing and monitoring health risk factors such as diet, exercise and obesity in children and adolescents, and seeing how information technology can aid the process.

“This is a huge opportunity to expand our ability to engage physicians and patients across the state in clinical research, with the goal of improving health,” said Michael Conlon, Ph.D., chief operating officer of the UF CTSI. “We’re going to be able to do community-based research across the state because of this partnership.”

The other projects

UF received seven grants in collaboration with other Florida institutions to quickly establish projects that can produce results in a short time. The other projects include:

• Carolyn Tucker, Ph.D., of the colleges of Medicine and Liberal Arts and Sciences; Folake Odedina, Ph.D., of the colleges of Medicine and Pharmacy; and colleagues from FAMU and Bethune-Cookman will address disease prevention and other health-care issues in rural and urban environments. The Community Health Workers Training and Research Institute will be featured in the next POST.

• IFAS researchers and colleagues from FAU and FSU will establish a task force to study and model climate change.

• UF information technology experts and colleagues from FSU and USF will expand broadband and enhance supercomputing capabilities across the state.

• College of Engineering researchers will facilitate biomedical engineering research and education efforts in the state with colleagues from UCF and USF.

• College of Engineering researchers and USF colleagues will develop “smart sensors” for environmental monitoring.

• J. Glenn Morris, M.D., director of the Emerging Pathogens Institute and collaborator Guenther Hochhaus, Ph.D., of the College of Pharmacy, will seek ways to optimize detection, prevention and treatment of vector-borne diseases with colleagues from USF.

In addition, UF received “Scholars Boost” awards to help with recruiting noted researchers in health and science and in chemistry, and to construct a veterinary research facility.

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12•10•01•11 POST
A hand-held device that strengthens the muscles involved in swallowing can address a serious symptom of Parkinson’s disease, according to a new UF study.

In what researchers believe is the largest randomized trial of a behavioral swallowing treatment in patients with Parkinson’s disease, scientists found that about one-third of the volunteers who used the device improved their ability to swallow. The findings appear in the Nov. 23 issue of the journal Neurology, the medical journal of the American Academy of Neurology.

Nearly 1 million Americans have Parkinson’s disease, according to the Parkinson’s Disease Foundation. Finding solutions to their swallowing problems is important because their most common cause of death is pneumonia caused by inhaling foreign material, such as food, during swallowing.

“The many muscles involved in swallowing progressively weaken in patients with Parkinson’s disease and become uncoordinated in the same way that patients lose coordination and strength in their arms and legs,” said Michelle Troche, Ph.D., the study’s lead investigator and a clinical lecturer and speech pathologist in the UF College of Public Health and Health Professions’ department of speech, language and hearing sciences.

It also becomes more difficult for patients to sense material in their airways and cough hard enough to expel it, she said.

For the study, researchers trained participants with Parkinson’s disease to exhale into an Expiratory Muscle Strength Training, or EMST, device. In previous studies, EMST has improved swallowing and cough function in patients with multiple sclerosis and in elderly, sedentary adults.

“EMST uses the basic exercise theory behind any strength training program,” said co-investigator Christine Sapienza, Ph.D., a professor and chair of the department of speech, language and hearing sciences.

“This small device capitalizes on that concept of overload with a calibrated pressure release valve that won’t open until you generate a great enough lung pressure. The patient or clinician can vary how much pressure is needed to open the valve on the device. The greater the pressure you need, the stronger the muscles have to be. It acts much like a pin on a weight machine and uses the same concept to strengthen the muscles involved in swallowing and breathing.”

Sapienza developed the device along with UF researchers Paul Davenport, Ph.D., a professor and interim chair of the department of physiological sciences in the College of Veterinary Medicine, and A. Daniel Martin, Ph.D., P.T., a professor in the department of physical therapy.

“Their efforts are pioneering and it is likely that this study will stand the test of time as a landmark in Parkinson’s disease swallowing research,” said research collaborator Michael Okun, M.D., a co-director of UF’s Movement Disorders Center and an associate professor of neurology with the College of Medicine and UF’s McKnight Brain Institute.

Participants in the study were divided into two groups of 30. In one group participants used the EMST device with proper calibration. The other participants used a device that looked exactly the same, but did not work to strengthen the muscles.

“Neither the participants nor the study therapists knew who had the real device and who had the sham device. Participants used the devices in their homes for 20 minutes a day, five days a week for four weeks. Therapists visited once a week to make sure participants used the device correctly. After the study period, participants in the sham group received the EMST treatment.”
The traditional way to predict whether children can regain movement after spinal cord injuries may exclude a small subset of patients who could benefit from therapy, according to two studies UF researchers presented at the Society for Neuroscience meeting in November.

In one study, researchers describe details of a child with incomplete spinal cord injury who continues to improve four years after recovering walking ability in a locomotor training program at UF, even though clinical assessment tools predicted he would never walk again.

In another presentation, the scientists discussed findings in which three of six children with severe, chronic and incomplete spinal cord injuries — patients who retain some sensation or movement below the injury — improved through locomotor training, to the point where they could take steps. Even the three who did not regain stepping ability acquired greater trunk control.

The research was part of the Kids Step Study conducted at UF and Brooks Rehabilitation and led by Andrea Behrman, Ph.D., P.T., an associate professor of physical therapy in the College of Public Health and Health Professions, and Dena Howland, Ph.D., an associate professor of neuroscience with the College of Medicine. Both also are affiliated with the McKnight Brain Institute and the Malcom Randall Veterans Affairs Medical Center.

“The prevailing clinical view is patients who are able to recover need to display early leg movement,” Howland said. “The children in our studies displayed minimal or no movement, yet some were still able to make significant improvement.”

One study participant was a 4 ½-year old boy who received a disabling cervical spinal cord injury at the age of 3½. Before he began in the locomotor training program, clinical measures predicted he would not walk again. After locomotor therapy, he now walks independently and has learned to pedal a tricycle, crawl, climb stairs and swim.

“These are all severely injured kids,” Behrman said. “Just think across the lifespan of a child who may be 3 or 6 or 10 years old at the time of injury, what a difference it would make if they could regain a fraction of mobility. Even better trunk control means quite a bit — pushing a wheelchair, or sitting behind a desk more comfortably, can be very important.”

Keeping healthy cells healthy

Proton therapy may reduce cancer treatment risks

By Theresa Makrush

One of the challenges in treating pancreatic cancer effectively with radiation therapy is the potential of harming surrounding healthy organs such as the small intestine, stomach and kidneys. Researchers at the UF Proton Therapy Institute have early evidence that proton therapy may significantly reduce this risk.

As reported in November at the 52nd Annual Meeting of the American Society for Radiation Oncology, a study from UF in conjunction with investigators from the University of Maryland compared a type of X-ray radiation called intensity modulated radiotherapy, or IMRT, with proton therapy for a series of pancreatic cancer patients. The study showed that proton therapy reduced normal tissue radiation exposure. The most significant reductions were seen for the small intestine, right kidney and stomach.

“The advantage of proton therapy is clear,” said R. Charles Nichols, M.D., an assistant professor of radiation oncology at the UF Proton Therapy Institute. “Our best IMRT treatments for pancreatic cancer can be improved upon by proton therapy. With protons we can both deliver the optimal dose to the targeted treatment area and reduce the risk of treatment complications without compromising the chance for cure.”

The study looked at eight patients with surgically removed pancreatic cancers who underwent IMRT as well as proton therapy. The proton plans achieved the same radiation dose to the treatment area as the IMRT plans, but reduced how much normal tissues received radiation by as much as 88 percent.
By Dalia Mousa

When Melissa Scites joined the UF Center for HIV/AIDS Research, Education and Service more than 10 years ago as a clinical research coordinator, there were few drugs available to treat HIV-infected patients, particularly children.

Speaking in the atrium of the College of Medicine-Jacksonville’s Learning Resource Center Nov. 30, Scites described how the UF CARES program participated in several key clinical trials that helped make more medications available. The HIV transmission rate for infants born to HIV-infected mothers was nearly 25 percent at that time. Now it is 2 percent, she said.

“Kids that once weren’t expected to live much beyond school age now have treatment options to manage their disease and give them hope for a bright future,” she said. “It has been exciting, rewarding and humbling to be part of that change, and it is a decision that I’ve never regretted.”

As sunlight filtered through the atrium and the Meachum Clarke and True Purpose singing group belted out inspirational tunes, community and staff members gathered to listen to speakers and celebrate the beginning of World AIDS Week Nov. 30. This year marked the 23rd year, World AIDS Day, part of World AIDS Week, has been observed around the globe. The goal of World AIDS Day is to bring people together to raise awareness about the disease, encourage routine HIV-testing and decrease the continuing stigma associated with HIV/AIDS.

According to the Centers for Disease Control and Prevention, AIDS was first recognized in 1981. This disease remains a priority for researchers and physicians, who work diligently to end the AIDS epidemic.

Mobeen Rathore, M.D., a professor and chief of the division of pediatric infectious diseases and immunology, and director of UF CARES, said that World AIDS Day has special significance this year because resources are decreasing.

“We need more advocacy and efforts to keep resources available for our patients. Events like these draw attention to this devastating epidemic,” Rathore said. “When I came to Jacksonville in 1991, it struck me how tremendous the needs of the HIV-infected population were. We worked to create a system of care that did not exist at the time. Since then, we have come a long way in our research efforts and are continuing to improve the care HIV patients receive.”

Scites, now the executive director of UF CARES, said the kickoff event also honors those who work tirelessly every day to ensure people living with the disease have resources, care, treatment, dignity and compassion.

UF CARES held the event, which also featured patient testimonials about how HIV/AIDS has affected their lives. As the only comprehensive, family centered program in North Florida and Southeast Georgia that serves adults, adolescents, children and pregnant women who are infected or affected by HIV, more than 1,200 people living with HIV/AIDS come to the center each year. The UF CARES goal is to promote the importance of early HIV detection, counseling, referral, treatment and prevention services.

For more information about UF CARES, visit http://www.hscj.ufl.edu/ufcares/.
Award helps faculty grow

W. Clay Smith, Ph.D., an associate professor of ophthalmology in the College of Medicine, has received a Faculty Enhancement Opportunity award for the fall semester. FEOs are intended to advance the academic, professional and scholarly abilities of faculty members, similar in intent to sabbaticals. However, FEOs are more flexible than traditional sabbaticals, helping offset salary and benefit expenses, travel costs and fees for conferences or similar learning experiences. Smith studies the biochemistry and cellular events that allow the eye to detect even a single photon of light. Defects in these biological processes often lead to visual complications, such as retinal degeneration and stationary night blindness, and learning more is expected to lead to therapies for people experiencing vision problems.

COLLEGE OF DENTISTRY

MATTHEW J. DENNIS, D.D.S., a clinical professor of oral and maxillofacial surgery, received the 2010 Daniel M. Laskin Award for an outstanding predoctoral educator in September during the 92nd Annual Meeting of the American Association of Oral and Maxillofacial Surgeons. Dennis directs the predoctoral oral and maxillofacial surgery program for dental students.

EMMA LEWIS, B.D.S., M.B.B.S., has been named director of the oral and maxillofacial surgery residency program, effective January 2011. Lewis brings extensive training in dentistry, medicine and surgery, and expertise in surgery education to her new position. She also is involved in a number of interdisciplinary research projects, including implant and bisphosphonate studies.

LUCIANA SHADDOX, D.D.S., Ph.D., an assistant professor, received the prestigious American Academy of Periodontology Teaching Fellowship Award during the association’s annual meeting in October.

Given by the AAP Foundation, the award recognizes a successful young faculty member in periodontology and provides a $50,000 salary supplement as a stimulus to keep young faculty members in academia.

JACKSONVILLE

ASHLEY E. BOOTH, M.D., an assistant professor and associate program director of the emergency medicine residency program, has been named president-elect for the Duval County Medical Society. Founded in 1853, the DCMS is the oldest medical society in Florida and serves as the voice for organized medicine in Duval County. Its mission is to promote the delivery of and access to high-quality, ethical medical care for the community, and to serve as an advocate for physician members and their patients.

JEFFREY GOLDHAGEN, M.D., M.P.H., received the 2010 Community Service Award from the Duval County Medical Society in recognition of his more than 15 years of advocacy for underserved and disadvantaged children of Northeast Florida. A professor in the department of pediatrics and chief of the division of community pediatrics, Goldhagen develops and oversees programs for children who are marginalized by physical conditions and social and environmental determinants, including those who are homeless, terminally and chronically ill, in foster care and in transition from pediatric to adult care. In addition, his volunteer service in support of these programs is significant.

ANDREW M. KAUNITZ, M.D., a professor and associate chair of the department of obstetrics and gynecology, has joined the editorial board of the journal Menopause. Menopause provides a forum for new research, applied basic science and clinical guidelines on all aspects of menopause. Published by the North American Menopause Society, the journal features peer-reviewed, original research papers and review articles.

Global Gators

Graduate students Wenjun Li, Heera Sharma, Benjamin Weber and Stephan Linden were honored at the UF International Student Awards Ceremony on Nov. 18. UF Outstanding Academic Achievement Awards were given in recognition of UF international students who have contributed to their colleges and the community.
MARIAN C. LIMACHER, M.D., the Suncoast endowed professor in cardiovascular research, has been named senior associate dean for faculty affairs and professional development for the college. In this new role, Limacher will focus on implementing collegewide programs that help faculty advance in their professional careers. She also will oversee initiatives to update promotion and tenure processes, enhance diversity of college faculty, and implement orientation, educational, mentoring and recognition programs that aim to improve faculty satisfaction, well-being and performance.

COLLEGE OF PHARMACY

CHARLES PELOQUIN, Pharm.D., a professor and director of the Infectious Disease Pharmacokinetics Lab, has been elected as a fellow of the American College of Clinical Pharmacy. Fellowship status is the highest honor the ACCP bestows upon its members and is given in recognition of the highest level of excellence in both science and practice of clinical pharmacy.

KAREN LEGATO, senior director of development and alumni affairs, has become the first recipient of the UF Foundation’s Debbie Klapp Memorial Award. Criteria for the award included unique overall achievement, strong collaboration, mentorship and creativity in approaching job, career and life. Legato, a member of the UF veterinary college’s development staff since 1999, has 27 years of professional fundraising experience. She has worked with donor events, corporate solicitations and campus campaigns, and was promoted into her present position at the college in 2008.

Remembering Don Allison

Don Allison, Ph.D., an associate scientist in the College of Medicine department of biochemistry and molecular biology, died Nov. 27 from injuries he had received in a car accident one month earlier.

Allison joined the UF College of Medicine in 1985 as an instructor for an undergraduate survey course in biochemistry and molecular biology. In addition to developing the curriculum for the current one-semester, 60-lecture-hour course, Allison demonstrated a penchant for lucidly explaining concepts. He became well known and appreciated for the reviews he held on the weekends prior to exams.

Allison earned his doctorate in 1979 at the University of California Santa Barbara, where he conducted research in the laboratory of Dan Purich, Ph.D., now a UF professor of biochemistry and molecular biology.

In addition to publishing 20 research papers and chapters in peer-reviewed journals and monographs, Allison published two books, both co-authored with Purich. At the time of his passing, the two were working on a definitive treatise on enzyme and metabolic inhibitors. Allison was also the main biochemistry consultant for Stedman’s Medical Dictionary, in which he introduced hundreds of new terms.

PHHP’s employee of the year

Heather Steingraber was named the College of Public Health and Health Professions’ 2010 Employee of the Year. She was honored at the college’s annual employee recognition dinner in October. Steingraber has served as the research project manager of the college’s Florida Center for Medicaid and the Uninsured since 2002. She is responsible for the center’s day-to-day operation and is a major scientific contributor to the center’s research programs. Steingraber was recognized for her ingenuity, leadership, organization and rapport with colleagues at many levels, from part-time staff to directors and deans. “In addition to her attention to detail and commitment to getting things done, her ability to communicate with just about anyone in an open and professional way has made the difference between the success and failure of a project on more than one occasion,” wrote one nominator.
After four years as an Army cryptographer during the Vietnam War and three years compiling a radiologic reference guide, Chris Sistrom, Ph.D., M.D., is still sifting through data.

Sistrom, who recently earned his doctorate in health services research from the College of Public Health and Health Professions, spends his days studying why doctors order imaging tests and how many of them are necessary.

With close to 30 years of clinical and research experience under his belt, Sistrom brings a unique perspective to health services research.

Sistrom, an associate professor of radiology at the UF College of Medicine, said his passion for research stems from his love of academia and gaining knowledge to help patients and doctors make rational decisions.

In 2001, Sistrom received a $150,000 grant from General Electric and the Association of University Radiologists, which helped pay for his graduate-level courses at UF.

He took the classes necessary for his degrees in public health and health services research, but he also took classes on subjects that interested him, such as philosophy, computer science, economics and statistics.

“When you delve into it a little bit, and you look into the philosophy of science, you see that underneath many physical facts or laws is doubt and controversy,” Sistrom said.

Sistrom received his undergraduate degree in computer science at the University of Oregon before going to medical school at Oregon Health Sciences University. After completing his residency and a three-year stint as a junior faculty member at the University of Virginia, Sistrom worked in private practice for seven years. He came to UF in 1999.

While in private practice, he spent three years working with Theodore Keats, a professor and emeritus chairman of radiology at the University of Virginia, updating the seventh edition of the reference text Atlas of Radiologic Measurement.

Sistrom helped double the volume of information in the book, adding more about newer techniques such as magnetic resonance imaging and ultrasounds, and expanding subject matter to better cover neurological, cardiovascular, chest and abdomen imaging.

All the data analysis involved with the book kept him interested in academics, and he decided to explore health services research, a mixture of several disciplines, including medical sociology, health economics, management and policy theory.

He wrote his dissertation using experience gained during a 2008 sabbatical at Massachusetts General Hospital, working with architects and administrators of the computerized radiology order entry system, where doctors enter all requests for outpatient X-rays and scans. The doctors get immediate feedback about the appropriateness of the test they are requesting.

Sistrom studied factors that influence decisions made by primary care doctors about whether to order imaging tests. When he applied these factors back to the physicians, his research enabled him to compare doctors’ tendencies to order tests, after considering the ages, sex and illnesses of their patients.

This ability to compare physicians and identify variation in the type and amount of imaging they request can help doctors reduce unnecessary scans.

Sistrom said insurance companies commonly compare doctors’ use of various resources in “efficiency” measures, intended to reward lower-cost doctors. But he said lowering costs is not the primary focus of his research. He just does the analysis and comparisons as truthfully and accurately as possible.

“At the end of the day, it’s all about (helping) the doctors,” he said.
Olivia Salinas, 2, enjoys a kiss from her mom, Michelle Burruezo during a Pompe disease luncheon held at Shands at UF on Nov. 30.

Ice covers pine needles and grass in front of Wilmot Gardens on the UF campus.

Pianist Sharon Yang entertains patients, visitors and staff in the Shands at UF Atrium. Yang has been playing piano for five years and regularly plays in the Atrium on Mondays.