ABOUT THE COVER

AND THE

WINNER IS ...

The basket of Match Day envelopes waits for each member of the graduating class of 2013 during the annual National Resident Matching Program’s Match Day. On this March day, 234 UTHealth Medical School students learn where they will continue their medical training following graduation. Of the 234, 110 matched to residency programs in Texas, and 44 of those matched to programs at our very own UTHealth Medical School. For more details on the match, please see Page 12.
Stories of uncertainties in health care and advances in medicine flood our daily news streams. How will the Affordable Care Act change medicine? Will replacement organs be 3-D printed on demand? Despite the unknowns, your University of Texas Health Science Center at Houston (UTHealth) Medical School’s mission remains steadfast – to ensure its graduates are best prepared to provide the preeminent health care of tomorrow.

With more than 13,000 medical and resident graduates, we have created a strong foundation rooted throughout the nation. Our alumni – some of whom you will read about in the pages that follow – are leaders at home and abroad. Our faculty are mentors and leaders in their respective fields, and we highlight a few of our clinical and academic programs in this report.

Over its history, this medical school has reimagined itself as a stronger, more vibrant part of the community, working in close harmony with our teaching affiliates, Memorial Hermann Health System, and Harris Health System, in addition to our growing network of outpatient offices, UT Physicians.

I have never been more proud to be a part of the UTHealth Medical School. Thank you for your contributions, which make these accomplishments possible.

Giuseppe N. Colasurdo, M.D., Dean
and H. Wayne Hightower Professor in the Medical Sciences
The University of Texas Health Science Center at Houston (UTHealth) Medical School
The sixth-largest medical school in the fourth-largest, and arguably one of the most diverse, cities in the United States debuted its first Office of Diversity and Inclusion in August 2013.

“When we got that first letter addressed to our office, then it became real – we really existed,” says Pedro Mancias, M.D., assistant dean for diversity and inclusion, adding that he framed the letter.

Dr. Mancias and LaTanya Love, M.D., are both assistant deans for the office, which promotes diversity and inclusion as it serves the students, residents, and faculty of the UTHealth Medical School. They have cross-appointments as assistant deans for the Office of Admissions and Student Affairs, as well as clinical appointments, and are actively involved in the teaching of students and residents.

“We want anyone to walk through the door and know that we honor diversity and represent the city at large,” explains Dr. Love, assistant professor of pediatrics and internal medicine.

The office was created out of a need, which came to light at the school’s first diversity retreat held in April 2013.

“We believe diversity is crucial to achieve institutional excellence, and that it is critical for the accomplishment of the mission of the Medical School. Our medical school has a strong commitment to serve the population of Texas, which is very diverse. We want to train culturally competent physicians who are able to meet the needs of our diverse nation,” Dr. Love says. “There was overwhelming support for a formalized method to support diversity, and Dean Colasurdo made it happen.”

Students and faculty can learn from diversity, Drs. Mancias and Love say.

“We hosted an event about the medical needs of veterans, and it was enlightening for everyone,” Dr. Love says, adding that diversity is a broad concept, which includes race, ethnicity, socioeconomic status, gender
identity, sexual orientation, religious beliefs, disability, military service, and other life experiences.

The office is supporting a new Gay-Straight Alliance student group and collaborating with such offices as Faculty Affairs and Admissions and Student Affairs to include diversity in ongoing efforts of outreach, recruitment, and retention.

“We not only represent and serve groups at large, but individual students as well – that is how we can affect change, one student at a time,” says Dr. Mancias, associate professor of pediatric neurology.

The office has sent faculty to a national faculty development conference, held welcome receptions for student groups, hosted a pre-medical conference for prospective students, and sponsored a diversity week to showcase student talents.

The office also is a place where students and faculty can discuss issues.

“We want to know about a course that isn’t culturally sensitive, or why faculty aren’t getting promoted,” Dr. Mancias says. “Such an office allows us to be proactive, not just reactive, on these issues.”

While there is a chief diversity officer of UTHealth, Ronald Johnson, D.D.S., the new Medical School office strives to be a model for the five other UTHealth schools, without such an office to emulate.

In the future, the office plans to offer education about health disparities and cultural sensitivities and be a resource for research studies. They also want to work with the Medical School’s Office of Alumni Affairs and community leaders.

“An excellent way to foster diversity in our entering medical school classes is to provide educational scholarships. We lose outstanding medical school applicants to schools that provide more funds than we are able to provide,” Dr. Love says.
ON LEADERSHIP

NEW DEPARTMENT CHAIRS CHECK IN

The Medical School has 24 departments, ranging from basic science disciplines to clinical specialties, each led by a chair. The four most recently named chairs took a few minutes out of their busy leadership roles to share their journeys and insights on becoming a department chair.

SEAN BLACKWELL, M.D.
Department of Obstetrics, Gynecology, and Reproductive Sciences

Sean Blackwell, M.D., was living in the heart of the rust belt when he was recruited to the UTHealth Medical School in 2007.

He and his wife Dr. Jerrie Refuzio, who also was recruited to the Departments of Obstetrics, Gynecology and Reproductive Sciences, waited six years before putting their house in Detroit up for sale due to the climate of the housing market.

“I am thankful for the economy here, and the quality of life Houston has to offer,” he says.

Dr. Blackwell joined the Medical School to serve as the principal investigator for the Maternal Fetal Medicine Unit Network grant. Established by the National Institute of Child Health and Human Development, it is one of 14 national clinical network centers established to take a large-scale approach to evaluate and create improved treatments for mothers and babies.

Dr. Blackwell also serves as the director of the Larry C. Gilstrap, M.D., Center for Perinatal and Women’s Health Research; as vice chair for clinical research in the Department of Obstetrics and Gynecology; and as assistant dean for Healthcare Quality in Perinatal Medicine and Women’s Health. He was appointed interim chair of the department in 2011 and named chair a year later.

“I don’t think anyone is prepared to be chair,” he says of his newest leadership role. “The majority of learning occurs after you start. You hope to stay chair long enough to be good.”
The first one in his family to attend college, he received his medical degree from the University of Illinois College of Medicine and completed an internship, residency in obstetrics and gynecology, and a fellowship in maternal-fetal medicine at Wayne State University in Detroit.

Dr. Blackwell, who also serves as the chief of staff for obstetrics and gynecology at Children’s Memorial Hermann Hospital and interim chief at LBJ General Hospital, says his vision for the department is to strive to be a “center for excellence in everything we do.”

In addition to offering routine and specialty ob/gyn care and boasting one of the largest fetal centers in the nation, the department receives 30-40 high-risk transfer patients from around the state every month.

“At Children’s Memorial Hermann Hospital, we are a children’s hospital in an adult hospital, so we can handle very unique situations and offer critical care services,” he explains.

Dr. Blackwell says he is proud of the outstanding faculty the department has recruited and retained.

“People are envious of how many experts we have here,” he says. “We have great physicians taking care of patients.”

Dr. Blackwell says he is inspired and driven by his family.

“My best role model was my father. If I can do half as well as he did, I will be in good shape,” he says. “The older you get the more you understand priorities. On the weekends I take one day for family, we have two sons, Jack, 15, and Aidan, 11, and one for work – usually talking to faculty.

“As chair you make sacrifices.”

ERIC EICHENWALD, M.D.
Department of Pediatrics

Appointed chair of the Department of Pediatrics in the summer of 2013, Eric Eichenwald, M.D., came to the UTHealth Medical School by way of Texas Children’s Hospital, where he was recruited from Boston.

“I spent 26 years in Boston at Harvard Medical School and at a joint program in neonatology between Boston Children’s Hospital, Brigham and Women’s Hospital, and Beth Israel Deaconess Medical Center,” he explains.

He joined the Medical School in 2010 and was appointed director of the Division of Neonatology in the Department of Pediatrics in 2011.

Making the leap from division director to chair means “a lot more meetings and responsibilities,” he says.

“I’m also dedicated to learning about the department and its different divisions as I start this job. I’m involved in a lot more discussions about revenues and expenses, which has been eye opening,” he says.

As chair, Dr. Eichenwald has been meeting individually with division directors to hear their wish lists and to improve the efficiency of care. A departmental strategic plan for the next 3-5 years is in the works.

He says his most immediate goal as chair is to “put our financial house in order.”

“Academic medical institutions are in a difficult place across the country,” he says. “Our department has grown in the last 5-7 years and expenses have increased. We need to reassess where we are going.”

This means, he says, how to finance ourselves, continue with the academic development of the department, support its research agenda, and continue close partnerships with affiliated hospitals – Children’s Memorial Hermann Hospital and LBJ General Hospital.

The department now has 160 faculty members spread across the pediatric subspecialties. Fellowships are offered in 11 subspecialties.

“This growth has allowed us to become a complete
department,” he says. “We owe our trainees the best training they can get – that will be the measure of our success.”

The department provides clinical care to many uninsured, as well as insured, children in the Houston area.

“It is an awesome responsibility to take care of other people’s children. To help parents have healthy kids is great fun and a great responsibility,” he says.

Leading by example, Dr. Eichenwald says, is a true measure of a leader.

“I’m still taking in-house night call in a newborn intensive care unit,” he laughs.

“The most important part as chair is to be entrusted with the faith of the faculty,” Dr. Eichenwald says. “My goal is to make the faculty as strong as possible. I want them to know I am a tireless advocate for them.”

Growing up primarily in Maryland and Virginia, Dr. Koehler completed her postdoctoral fellowship at Harvard Medical School and her Ph.D. at the University of Massachusetts.

The smallest basic science department in the UTHealth Medical School, the Department of Microbiology and Molecular Genetics has experienced a growth spurt this year – adding three new faculty to the existing 10.

“We are small but we are mighty,” says Dr. Koehler, holder of the Herbert L. and Margaret W. DuPont Distinguished Professor in Biomedical Science. “This department makes numerous important contributions to science and to UTHealth.”

Dr. Koehler believes that her department is the top microbiology department in Texas.

“We have an excellent, diverse set of researchers, studying microbial fitness in pathogens and non-pathogens, and we are expanding into new areas of molecular genetics,” she says.

The department has a strong program for graduate students, and its faculty are leaders in the UTHealth Graduate School of Biomedical Sciences. The departmentally based graduate program in Microbiology and Molecular Genetics is frequently referred to as a model program within the Graduate School.

“Our faculty are pre-selected to be passionate about graduate and medical student education and mentoring,” she says. “We take a lot of pride in student training, and we do a great job of that.”

As far as changes from faculty to chair, Dr. Koehler says, “The most notable difference is that my circle of interactions has expanded, which is great because I

THERESA KOEHLER, PH.D.
Department of Microbiology and Molecular Genetics

Dr. Theresa Koehler, a self-proclaimed East Coaster who never thought she would live west of the Mississippi, was named chair of the Department of Microbiology and Molecular Genetics in April of 2013.

Dr. Koehler served 18 months prior as interim chair of the department and 19 years before that as a department faculty member.

She says she came to the UTHealth Medical School in 1991 because of the people.

“I was finishing up my postdoctoral fellowship and looking for a faculty position. I knew the chair, Dr. Sam Kaplan, was an internationally recognized scientist and that he would be a strong chair and mentor,” says Dr. Koehler, who adds that Dr. Kaplan became her most important career role model.

At the time, the department was brand new.

“It was a great opportunity to come in on the ground floor with three other assistant professors and a few senior faculty to develop the program,” she adds.

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think of myself as a people person. I also like organization and problem-solving.

“The core values and fundamental ideals that were established when the department began are still in place. We’ve just grown in size and influence,” Dr. Koehler says.

With regard to her identity, Dr. Koehler and her husband are happily raising two Texas natives, and she reckons that having lived in Houston for more than 20 years now, she is officially a naturalized Texan.

JAMES MCCARTHY, M.D.
Department of Emergency Medicine

Appointed chair of the Department of Emergency Medicine in June 2013, James McCarthy, M.D., has been a faculty member at the Medical School for the past 12 years.

But it wasn’t the just the busiest Level 1 and 3 trauma centers in the nation that brought him to Houston following his graduation from Loyola University Stritch School of Medicine and completion of his residency at the University of Chicago.

“I married a girl from Houston, and she put Houston on the map for me,” he explains.

While he says he misses the seasons of home, he welcomes the challenges of his new role.

“My vision is for our department to be the premiere academic emergency medicine program in the nation, grow our research footprint, and continue an outstanding clinical program,” he says.

With cadre of 54 emergency medicine residents who train at the nation’s busiest trauma centers – in Memorial Hermann-Texas Medical Center and LBJ General Hospital, and a research program with $1.5 million in expenditures, Dr. McCarthy has the infrastructure to make his vision come true, and growth of published research is already on track.

He says his department is preparing to handle the increase in patient volumes as a result of the Affordable Care Act.

“The emergency room is an expensive place to provide primary care, but we are expecting volume to increase without question,” Dr. McCarthy says.

Spending the last nine years as chief of emergency medicine services of Memorial Hermann-TMC, Dr. McCarthy is bringing his experience to bear as chair. He also has been participating in a leadership curriculum at UTHealth.

“I have more meetings than I used to, but they are a different type – they now are focused on departmental operations and faculty development,” he says.

As a leader, he says his creed is to “act the way you expect everyone else to act and be the first one to step up.”

This includes being visible doing the “hard work” and putting the faculty before himself. “It’s a team effort,” he says.

Dr. McCarthy acknowledges that running a department is not a one-man job and that others have helped to shape his professional traits.

“My former chair, Dr. Brent King, exhibited model behavior, putting the faculty before himself, and my father is a scientist at an academic institution. I also have mentors in Drs. Terry Van den Hoek and David House who helped to develop my career,” he explains.

To learn more about the new UTHealth Medical School chairs, watch their videos: go.uth.edu/2013chairs
Traveling on medical missions with his father to Jamaica, Antigua, and the Dominican Republic provided David Sandberg, M.D., more than just an appreciation for Caribbean culture.

It was on these trips watching his father, an ophthalmologist, perform eye surgeries and assisting him in the clinics that Dr. Sandberg quickly caught the passion of helping others through medicine.

“My most important role models in my career have been my parents,” says Dr. Sandberg, who serves as the director of the Division of Pediatric Neurosurgery in the Department of Pediatric Surgery.

With both of his parents involved in global community outreach, Dr. Sandberg’s earliest career thoughts centered around global health or primary care, with a heavy emphasis on community service.

“I directed a homeless shelter in college and thought I would likely choose public health as a career, but when I did my first rotations through the hospital as a medical student, I found that I loved surgery, especially neurosurgery,” he explains.

Dr. Sandberg received his undergraduate degree from Harvard University, his medical degree from the Johns Hopkins University School of Medicine, and completed neurosurgery residency training at Weill Medical College of Cornell University/New York Presbyterian Hospital.

Joining the UTHealth Medical School in June 2012 as director of the Division of Pediatric Neurosurgery, by way of University of Miami Miller School of Medicine, Dr. Sandberg has pursued new opportunities for research collaboration and growth.

Dr. Sandberg is leading innovative research that enables local delivery of chemotherapy into the brain’s fourth ventricle to attack brain tumors.

“This is the first clinical trial in humans in which chemotherapy is delivered directly into this region of the brain,” he says. “It is a pilot with five enrolled patients who are ongoing in their treatment and doing great, with a total of 10

“I love kids, and I am rewarded each day by watching kids and their families overcome the most challenging circumstances.”

- Dr. David Sandberg, director of the Division of Pediatric Neurosurgery
In addition to research pursuits, Dr. Sandberg and his pediatric neurosurgery colleagues treat patients who need surgery for tumors, hydrocephalus, vascular issues, congenital anomalies, spina bifida, craniofacial conditions, and spasticity. Patient care can begin at prenatal consults, just after birth, or at any time through adolescence.

Dr. Sandberg, who also serves as the director of pediatric neurosurgery for the Mischer Neuroscience Institute at Memorial Hermann, notes many high points in his chosen specialty.

“It’s so rewarding to help parents get through one of the most challenging times of their lives when their child needs neurosurgery. Most of the time, the kids do really well, and we are able to give the parents good news,” he says. “I love the daily challenges of operating on the brain, and I enjoy pursuing research that will hopefully push the field forward.”

The greatest challenges, he says, are giving families difficult news. “If their child dies or has a devastating injury to the brain or spinal cord, it is always hard,” Dr. Sandberg says. “No family is prepared to deal with something like this.”

But, Dr. Sandberg says, he wouldn’t have chosen a different career.

“It is such a privilege to have parents entrust me with care of their precious children when so much is at stake,” he says. “I love kids, and I am rewarded each day by watching kids and their families overcome the most challenging circumstances.”
From a small town, to a big city with a small-town feel, John Munz, M.D., says he feels comfortable calling Houston and the UTHealth Medical School home.

The Grove, Texas, population 65, where Dr. Munz grew up, is considered a ghost town by some and a Texas historical town by the Smithsonian Institute.

“Everyone in my family has a farming or mechanic background,” says the assistant professor of orthopaedic surgery. “But I wanted to be an orthopaedic surgeon for as long as I can remember.”

Dr. Munz says the start of his journey to becoming a trauma orthopaedic surgeon started earlier than high school, when he would volunteer in the emergency room at Scott & White hospital in Temple, Texas.

“From these experiences I saw multiple orthopedic injuries that were intriguing to me,” he explains. “I like the idea of directly fixing things with my hands.”

Graduating from Texas A&M University, Dr. Munz started medical school at UTHealth in 2000. He also completed his internship and residency at UTHealth, but took one year away to complete a fellowship at Harborview Medical Center in Seattle before returning – this time as faculty.

“I came back here because I always really loved Houston and the university and wanted to specialize in orthopaedic trauma and take it to a new level,” he says. “The opportunity to provide care for the people of Houston, and Southeast Texas is truly an honor and a privilege.”

The subspecialty has grown even in the time since Dr. Munz graduated from medical school. Today there is a fellowship-trained orthopaedic traumatologist on call 24/7, and the Department of Orthopaedic Surgery trains three orthopaedic trauma fellows every year.

“This has all been made possible by excellent leadership, from Dr. Walt Lowe our chairman, and the intuitional support, from Dr. Giuseppe Colasurdo our dean,” Dr. Munz says.

As the busiest trauma center in the nation, the Memorial Hermann Texas Trauma Institute receives patients from beyond the region via Life Flight and is the trauma center of choice for injured police and firefighters.

“We just had a 27-year-old police officer from Splendora who came here following an accident involving a high-speed chase. He had multiple injuries, both legs shattered, pelvis injured, and required multiple
surgeries,” Dr. Munz says.

Dr. Munz says the typical patient is a car-accident or other high-energy trauma victim, such as a motorcycle crash or industrial accident. Patients may be pediatric or adult.

“Today we see more complex injuries. More patients are surviving auto accidents and the level of injury is unparalleled,” he says. “For me, orthopaedic trauma surgery is the opportunity to help people, taking a person in acute need and putting them back together.”

Dr. Munz says that he and his colleagues are able to reconstruct injuries better than ever.

“We are dedicated to fixing trauma, and it takes the efforts not only of the surgeons but also the residents, physician assistants, nurse practitioners, and other clinicians who are all dedicated to the patients,” he says. “I have some of the best partners in the world, who are all focused on patient care, resident education, research, and making this the best place ever.”

The opportunity to teach students and residents was a big factor in Dr. Munz’s decision to return to UTHealth.

“Education and patient care are equal priorities to me,” says Dr. Munz, whose teaching efforts recently were rewarded with the national Howard Rosen Table Instructor Award from AOTrauma North America. “My vision for the residency, and what we tell the residents, is to provide the best patient care possible, maintain the utmost integrity and professionalism, and lead by example.”

Dr. Munz has a busy schedule both with patients and presenting around the nation.
Members of the UTHealth Medical School Class of 2013 participate in the March 15 National Resident Matching Program’s Match Day on Webber Plaza, among friends and family, learning where they will further their medical training.

To be able to retain our very talented graduates as residents is one of our greatest accomplishments.

- Dean Giuseppe Colasurdo, M.D.

For more images from Match Day 2013, see:
go.uth.edu/2013matchday
eeding surgery to remove a neck mass that threatened to block his trachea, a patient is transferred from San Antonio to the acclaimed Children’s Memorial Hermann Hospital in the Texas Medical Center in Houston for care. But this patient presents a special surgical challenge – he hasn’t been born yet.

“The fetus has become a patient, and we are running a fetal emergency room,” says Kenneth Moise, M.D., co-director of the Texas Fetal Center.

The fetus is intubated while still attached to the placenta and then it is “born” by C-section. Surgeons subsequently removed the neck mass from the baby several days later.

To orchestrate the delivery and care of such a delicate patient requires a highly skilled and comprehensive team. Comprised of surgeons and imaging and diagnostic specialists, the Texas Fetal Center includes faculty from the UTHealth Medical Schools departments of Obstetrics, Gynecology, and Reproductive Sciences and Pediatric Surgery and works closely with obstetricians and all pediatric specialists to deliver the best care for patients.

“It’s a big team to take care of these kids. The Texas Fetal Center does amazing work and has grown from a promise to a very busy service,” says Sean Blackwell, M.D., chair of the Department of Obstetrics, Gynecology and Reproductive Sciences.

The promise of the Texas Fetal Center (TFC) began with pediatric surgeon Kuojen Tsao, M.D., who joined the Medical School’s Department of Pediatric Surgery in 2007.

“We have evolved from being primarily a diagnostic center to one that offers the full spectrum of fetal surgery. This puts us on par with the other major fetal centers in the country,” says Dr. Tsao, who co-directs the TFC with Dr. Moise and Anthony Johnson, D.O., professor in the Division of Maternal-Fetal Medicine.

Drs. Moise, Johnson, Tsao, and Genevieve Campbell, R.D.M.S., perform a fetal spina bifida surgery.
Texas Fetal Center Physicians include Dr. Ramesha Papanna, Dr. Anthony Johnson, Dr. Kuojen Tsao, Dr. Helena Gardiner, Dr. Kenneth Moise, and Dr. Michael Bebbington.

and the Department of Pediatric Surgery.

Drs. Moise and Johnson, who started working together in 2000 at the University of North Carolina’s Center for Maternal and Child Health, were recruited to Texas Children’s Hospital in 2006 and then moved down the street to UTHealth in 2011.

Two years ago, the TFC took a step forward by offering open fetal surgery, which is performed on the fetus while the mother is still pregnant. The first case was on a fetus with spina bifida and is done between 20 and 26 weeks of pregnancy.

The group now has performed 15 spina bifida surgeries and more than 500 laser surgeries for twin-to-twin transfusion, during which the surgeon severs connected blood vessels between twins in utero.

Twin-to-twin transfusion occurs in about one in 10 sets of identical twins, when, sharing a placenta, one baby donates blood to the other. Without treatment, the loss rate is 90 percent.

“With four of us here doing this, we are the most skilled and trained team in the nation,” Dr. Moise says.

Patients come to the TFC from as far away as Hawaii and Alaska.

“We offer a unique, full-service operation, and we never shut down,” Dr. Johnson says.

“Most of our families have our phone numbers so they can contact us anytime,” adds Karen Moise, maternal-fetal medicine lead nurse coordinator. “We are about making every day Mother’s Day.”

In addition to fetal surgeons Drs. Tsao, Moise, and Johnson, the TFC team includes Michael Bebbington, M.D., MHSc, director of fetal imaging and prenatal diagnosis, who joined from the Children’s Hospital of Philadelphia last year, and Helena Gardiner, M.D., Ph.D., who joined the team from Imperial College in London, where she did perinatal cardiology.

“The size and breadth of this team provides for continuity of care from prenatal diagnosis through birth and into the neonatal period, allowing the family to be cared for in one place,” says Dr. Gardiner, co-director of the Fetal Cardiology Program.

“We have a phenomenal collection of people who make this team work – all of the people who support us, sonographers, office staff, nursing staff, coordinators, all contribute to the excellence of the program. We have tremendous support from the hospital, UT, and the department. We can have all the excellent doctors, but without those supporting us, it doesn't work as well,” Dr. Bebbington adds.

When an obstetrician finds something out of the ordinary during a pregnancy, the patient is referred for comprehensive ultrasound imaging. The UT Division of Maternal Fetal Medicine oversees 10 ultrasound units in and around the Houston area, primarily at Memorial Hermann hospitals.

“The majority of our patients need education so that there are no surprises when the babies are delivered – they are aware of any subsequent surgeries or care issues in advance, and better diagnostics allow us to do that,” Dr. Tsao says.
While the emotions of patients haven’t waivered over the years, patients who come to the TFC are more prepared, thanks to internet research. “They have Googled the condition and ask awesome questions,” says Karen Moise, who met her husband, Dr. Moise, when she was a labor and delivery nurse at Vanderbilt. “No longer are most of them in the dark.”

Technology developments and less invasive diagnostic methods are improving patient outcomes. “The technology available today, from the probe selection to post-image processing, is completely different compared to what was available even 10 years ago,” Dr. Bebbington explains. “We can also now screen for Down Syndrome and some other genetic abnormalities as early as 10 weeks gestation through a maternal blood test. This has prevented having to expose women to higher risk procedures.”

With three out of four heart conditions not being diagnosed before birth, cardiac imaging is an area the TFC seeks to improve. “One percent of kids have a heart disease,” Dr. Gardiner says. “Seventy-five to 80 percent of all major problems should be detectable.”

Cardiac issues can include valve problems, underdeveloped ventricles, holes in the heart, a combination of lesions, or something missing.

Through a training program for sonographers – at their locations and on their machines – Dr. Gardiner is promoting an effort to improve the cardiac anomaly detection rate among fetuses. “Training is the missing link,” she says. “Our goal is that within two years we will have the accurate detection rates up to 70 percent within the UT family.”

TFC specialists are advancing the future of fetal care, which includes research collaborations with Charles Cox, M.D., co-director of the Memorial Hermann Texas Trauma Institute and Children’s Fund Inc. Distinguished Professor in Pediatric Surgery, on extracting stem cells from amniotic fluid to build tissues or organs that are damaged or missing in order to implant following birth.

TFC physicians also are involved in research to develop a waterproof sealant that is derived from a sand castle snail. “When you poke a hole in the uterus, it leaks and doesn’t heal itself, which can result in a premature birth,” Dr. Moise explains.

Dr. Johnson is leading the charge for new options for diaphragm hernia. One in 2,500 babies have a diaphragm hernia, and three centers in the United States treat it with a static tracheal balloon. “We have an ethical issue with it – if the baby is born with the balloon in place, it can’t breathe,” Dr. Johnson says.

Working with the FDA and six other universities, Dr. Johnson is trying to get a balloon now used in Europe approved for use in the United States.

He also is working with engineers at the Oak Ridge National Laboratory to develop a better balloon that can be popped remotely and doesn’t require a second surgery. He adds that the balloon is palliative for diaphragm hernia and not a cure.

In order to prepare the next generation of providers, TFC offers one of just three fetal intervention fellowships in the country and has already graduated one, Ramesha Papanna, M.D., MPH, who recently joined the TFC group. “The TFC exemplifies the spirit of this institution, enthusiasm, dedication, and the ability to innovate to do the best for our families,” Dr. Tsao says.

“It’s an exciting time,” Dr. Johnson adds. “We’ve got the best jobs in the world!”

For more information on the Texas Fetal Center, see: go.uth.edu/2013tfc
The clinical faculty practice of the UTHhealth Medical School, UT Physicians, has experienced unparalleled growth over the last four years. With offices originally located solely across the street from the Medical School, UT Physicians now boasts more than 40 clinical locations in and around the Greater Houston Area.

Carman Whiting, M.D., medical director of UT Physicians at Sienna Village in Missouri City, says that she chose UT Physicians for the same reason the majority of her patients do – it’s close to home.

“This location is 7 minutes from my house – versus an hour each way when I saw patients at the Aldine Community Health Center,” Dr. Whiting explains.

Dr. Whiting completed her residency at the UTHhealth Medical School in 2002 and stayed on as faculty, working for Aldine Health Center for several years, when she learned a UT Physicians location was going to be built in Missouri City.

“I asked Dr. (Carlos) Moreno if I could transfer, so I could be closer to home and my daughter,” she explains.

That was nearly four years ago, and the UT Physicians at Sienna Village has grown tremendously since then. Just within the last year, patient visits are up 40 percent.

The idea of community-based UT Physicians clinics is one that started with the goal of bringing UT Physicians to the patients.

“When I came here, we had just opened Sienna and had the Bellaire location,” remembers Dr. Thomas Murphy, assistant dean for community affairs and health policy. “Then, we brought Bayshore on board, which is a 20-plus year practice in community; shortly after that, we brought on Dashwood and Cinco Ranch, which was built from the ground up as a primary care based clinic with multi-specialty offerings.”

The growth of UT Physicians was part of a carefully measured plan to support the UTHhealth Medical School.

“Back in 2007, 2008, we created a strategic plan for UT Physicians to follow the growth and population changes in Houston,” explains Andrew Casas, chief operating officer of UT Physicians. “We knew that if we didn’t grow outside of the Texas Medical Center, we would not survive as a group practice.”

In addition to adult and pediatric primary care, the UT Physicians at Sienna Village location provides specialists in cardiology, geriatrics, obstetrics and gynecology, pediatric neurology, and orthopaedics/sports medicine.

“People like to stay in their community – to get them to venture outside this bubble is challenging,” Dr. Whiting says.

Having clinics around the city also offers improved patient care through a unified electronic health record (EHR).

“To provide exemplary care, we need an integrated system where primary care works well with specialists, all on same EHR,” Dr. Murphy explains. “The goal of the UT Physicians network is to provide a continuum of care across all age groups with a consistent, coordinated group of providers.”

- Dr. Thomas Murphy, assistant dean for community affairs and health policy
of care across all age groups with a consistent, coordinated group of providers.”

Access extends beyond location. The Sienna Village location offers extended hours, until 7 p.m. on Wednesdays and 8 a.m. to noon on Saturdays, to accommodate patients.

Many new patients come from word-of-mouth referrals.

“Our doctors do a good job and spend time getting to know the patients,” Dr. Whiting says. “If a patient trusts you, that’s what keeps them here and then they refer family and friends.”

Dr. Whiting describes her patient population as “younger and relatively healthy, with lots of families and few complex patients.” Providing care across the age spectrum – from infants to geriatrics, Dr. Whiting says the ages of most of the clinic’s patients are between 35 and 50.

Dr. Murphy says that patients outside of the Texas Medical Center provide stability and long-term patient relationships. “Right care, right place, right cost – it’s a simple concept,” he says.

To meet the community’s medical needs, in the same block as UT Physicians at Sienna Village, there now is a Memorial Hermann complex, a free-standing emergency room, and a women’s health center.

“This area is definitely growing, and there is more area that can be developed,” Dr. Whiting says. “We are here at the right time.”

The Affordable Care Act promises to drive more patients into the health care system, boosting both primary care and specialty visits. There also are changes in the business of medicine.

“What has changed now is the economic realities so that individual physician practices find it nearly impossible to maintain their individuality. Being affiliated with an academic medical institution is an attractive option for many physicians,” Dr. Murphy explains.

The interest and availability of more physicians means many area physicians are joining the UTHealth Medical School and UT Physicians.

“And the quality of our medical education improves dramatically because we are getting best physicians with an increased level of enthusiasm. As we continue to expand, the palate of choices for student rotations also will increase,” Dr. Murphy says.
Private jets, waiting lists, cold storage. What do these items have in common? They are just a few of the necessary tools for a successful organ transplant center.

“Ten years ago, I used to walk around with patients’ names and information in my pocket, waiting for the call that a donor organ was available,” explains Steve Bynon, M.D., head of the Organ Transplant Center at Memorial Hermann-Texas Medical Center and director of the Department of Surgery’s Division of Immunology and Organ Transplantation.

Today, donated organs are listed on a secure website, offered to physicians to select for their patients, based on a nationally run allocation system. Patients also are listed and ranked – the sickest patients go to the top of the organ waitlist.

“You might think that would be a waste of an organ – to give it to the sickest first, but the outcomes for the most sick are only about 7 percent worse than a healthier patient, and they gain the most from the transplant,” Dr. Bynon explains.

The 70-person transplant team at Memorial Hermann-TMC includes three surgeons, Bynon; Mark Hobeika, M.D.; and Wasim Dar, M.D., Ph.D. They care for both adult and pediatric patients – some of whom travel here from across the globe for liver, kidney, and pancreas transplants. Additional medical faculty involved in the care of adult transplant patients include Horacio Adrogue, M.D., medical director of renal and pancreas transplantation; Aleksandra De Golovine, M.D., transplant nephrologist; Mike Fallon, M.D., chief of service, gastroenterology and hepatology; Victor Machico, M.D., medical director of liver transplantation; and Kevin Dasher, M.D., transplant hepatologist. The histocompatibility lab is directed by Min Ling, M.D., Ph.D. Pediatric medical support is provided by Rita Swinford, M.D., and Nicole Hayde, M.D., pediatric nephrology; and Essam Imesis, M.D., pediatric hepatology and medical director of the Pediatric Liver Transplant Program.

In a recent five-day period, the team transplanted four livers and two kidneys. “Dr. Hobeika jumped on a plane to procure a 50-year-old liver from Tulsa, and we also got a 76-year-old liver that no one wanted locally all in one day,” Dr. Bynon says.

Following liver transplantation surgery, patients stay in the hospital a mean average of 7 days (less than Medicare’s average length of stay). If they come in for transplantation from home, instead of from a hospital, they are usually discharged within 5-6 days.
“We are very protocol oriented now to minimize complications and improve efficiencies,” Dr. Bynon says. The center’s work has paid off – utilization rates on blood and materials used during liver transplants have dropped by 50 percent and by 25 percent on kidney transplants.

“If we are really efficient in our care, our quality and cost will fall in line,” Dr. Bynon says.

But transplantation isn’t cheap.

The cost of an organ is $35,000 to $40,000 – the meter starts ticking from the time the donor is brain dead. The physicians personally inspect the organ before accepting it – traveling by private plane to save time. The liver has just 12 hours of life after removal, and kidneys have 38 to 40 hours.

“One person’s garbage is another’s castle. The four livers we got last week were all turned down by other transplant centers, and all of those patients are doing well,” Dr. Bynon adds. “Nothing was wrong with those organs.”

After removal, the organs are bathed in preservation fluid, at a cost of $5,000 a bag, and then put in cold storage – in a cooler – for transport. Kidneys are maintained with the preservation fluid on a pump to keep the organ cold.

There are about 6,500 organ donors in the United States each year. The oldest transplant program in Texas, Memorial Hermann-TMC is a very busy organ donation center.

“It makes sense that we have a lot of donors in Houston, as the fourth-largest city, with the busiest trauma center in the United States,” Dr. Bynon says. “We think there is still untapped potential for organ donation beyond Memorial Hermann-TMC.”

There are 11 geographical regions of organ allocation, and transplant wait times vary greatly by region.

Texas patients have one of the longest waits for livers in the country, but with the aggressive organ acceptance of the Memorial Hermann program, the wait is between 6 and 9 months.

Six people recently were involved in a live donor match that included three patients and three kidney donors from Charlotte, Minneapolis, and Memorial Hermann. Each patient had a live donor, but they weren’t the match, so the organs were transported across state lines to their respective recipients.

“We can save Medicare almost $150,000 a year of dialysis costs with a transplant,” Dr. Bynon says, adding that live donors have a better survival rate.

While there are five organ transplant centers on Fannin Street in the Texas Medical Center, the service is not offered by all hospitals due to the incredible resources needed. Organ transplant requires a dedicated place and team in the hospital, which includes anesthesiology, pathology, infectious disease, critical care, and radiology. “We touch every service in the hospital,” Dr. Bynon says.

According to recent outcomes data, the one-year survival rate for liver transplantation at Memorial Hermann-TMC is 93 percent, versus the expected survival rate of 85 percent. Only one program in Texas has a better survival rate.

“The disease you get transplanted for is the biggest determinant of survival, in addition to the program you are transplanted in,” Dr. Bynon explains.

The Memorial Hermann/UTHealth team will do 45-50 adult liver transplants this year and transplanted 7 pediatric livers and 11 pediatric kidneys last year.

Looking to the future, Dr. Bynon says Memorial Hermann should plan for a program of over 400 transplants per year – all organs. “The population base supports that, and other patients can get to Houston easily,” he says.

Where a patient goes for liver transplantation many times is determined by insurance. Insurance companies decree which programs are “quality” and then refer their policyholders there.

“When I was at the University of Alabama, we were a preferred provider for Kaiser and at one time performed more transplants in patients from Atlanta than the local programs did,” he explains.

Dr. Bynon didn’t grow up longing to be a doctor.

― Dr. Steve Bynon, director of the Division of Immunology and Organ Transplantation

The disease you get transplanted for is the biggest determinant of survival, in addition to the program you are transplanted in."
He turned down a opportunity for an engineering scholarship offered by the Air Force because he wore glasses and figured he would not be able to fly.

“My dad enrolled me in pre-med. He was the director of personnel for the Tennessee Valley Authority, and he told me ‘you want a job where you can be your own boss,’ and that was a doctor or a lawyer,” Dr. Bynon recalls.

After his first year of getting acclimated to the University of Tennessee, Dr. Bynon saw a show on PBS that cemented his career choice. “I thought, I’d like to do what that guy does. And that guy was Dr. Red Duke,” he says, adding that he buckled down in his studies, making highest honors.

During medical school at the University of Tennessee, Dr. Bynon considered cardiology, orthopaedic surgery, and cardiothoracic and vascular surgery. After graduation, he went into private practice for surgery and quickly got bored, deciding to do a liver transplant fellowship at the University of Nebraska.

“The Nebraska hospital had 30 beds in the ICU, and 22 of those were liver transplants,” he says. “Five patients died on my first day, but I figured I could do anything for two years, so I scrubbed in every case, taking off just two weeks in those two years.”

Before moving to Houston in 2011, Dr. Bynon established the pediatric transplant program at the University of Alabama and took over the pediatric kidney and liver programs there.

“We did 90-100 transplants a year and routinely had some of the best results in the country. Insurance companies started to take notice – sending us patients from both coasts,” he says.

In addition to gaining access to the insurance networks, Dr. Bynon says he is looking to create a collaborative basic science research program for organ transplant here.

“Transplanted kidneys age – the half-life is 12 years. We want to learn how we can repair the damage with stem cells to make the kidney last longer and discover how we can turn ‘bad’ donated organs into good organs for transplant,” he says, adding that this will be in conjunction with the UTHealth Medical School’s Institute for Molecular Medicine.

“We have a simple goal to be the best transplant program on Fannin Street. Because if you are the best on Fannin, you are the best in Texas, and by default one of the best in the nation,” Dr. Bynon says.
Dear Dr. Von Allmen,

I want to thank you with all my heart for the amazing care you have given Savanna (as well as me & Ken) through our journey. When her spasms began, I was afraid to even dream that she might be one of the rare “lucky ones” who could be spared from a lifetime of seizures & the many associated challenges through a miracle surgery. I prayed like I’ve never prayed in my life for God to guide us and give us the strength and energy we needed to survive and care for her. I know in my soul that he led us to you. The confluence of factors that had to come together for us to move to Houston, for Savanna to get the right diagnosis and treatment as quickly and effectively as she did could only have come by His hand. Why she (we) were found worthy, I will never know.

I have so much admiration and respect for you, as a mother, as a woman, as a doctor, and as a bold entrepreneur in your field. You saved Savanna’s life, her quality of life, and in doing so, mine as well.

She’s doing amazing. We traveled to Louisville, KY for Christmas, and it’s pleasantly reassuring to see her go through the common childhood illnesses of Strep throat, ear infections, and the like.

She’s happy. She’s healthy. She teases us by walking and looking back over her shoulder to make sure we are watching/following her. She dances and shakes her booty on request. She waves and blows kisses. She plays cars with Austin, and wrestles with Brandon. She giggles when thrown in the air or on the couch. She runs and giggles from “I’m gonna get you” when I chase her and eventually give her zerberts on her belly.

She’s starting to show an interest in books with a few torn pages as casualties. She’s social and likes to explore and meet new people. She snuggles. She climbs up and down the stairs. She’s starting to make more sounds in addition to “mama & baba.” She’s starting to use more inflection, and saying pa pa, da da, … She’s starting to do puzzles. She’s graduated from AFOs to less intrusive orthotics. Ken feels good enough about her progress that he is talking about possibly going back to work next year, which will allow me to possibly cut back to 20 hours/week, down from way too many hours.

None of this would have happened without you, your dedication, your training, and your willingness to aggressively treat her.

Savanna was first diagnosed on 12/19/11. We spent that Christmas Eve & most of Christmas Day in the hospital before Ken broke her out. It was hard to hear “Merry Christmas” that year. My dad wished us a “Blessed Christmas,” and we found that to be more appropriate.

If you have anyone going through a similar situation that needs someone to speak with, especially at Christmas time, please provide them with my phone number.

Have a Wonderful, Merry, and Blessed Christmas with your precious family. If you ever, ever wonder between long hours or thankless tasks, if what you’re doing is worth it, know this, it absolutely is, and I’m so grateful to you, Dr. Tandon, and your entire team for what you’ve done for us.

Best Regards,
Rebecca S. Lininger
When Clarence Fontenot was in junior high, he wanted badly to play football. But when his mother took him to the local physician in Baytown for his required physical, he immediately failed to get clearance to join the team.

“The doctor said that he felt a gap in my chest bone and it worried him, so my life as an athlete ended before it even started,” Fontenot says. “I’d never had any problems, so it was frustrating to hear I couldn’t play.”

As it turns out, that physician’s vigilance may have saved Fontenot’s life. Just a few months later, Fontenot collapsed after running into a store to pick up a forgotten receipt. He was rushed to the local hospital where he was diagnosed with having suffered a Sudden Cardiac Death attack, brought on by irregular heart rhythms and ventricular fibrillation. Treatment required inserting an implantable cardioverter-defibrillator (ICD) into Fontenot’s chest. The ICD works by detecting and stopping abnormal heartbeats by continuously monitoring the heart and delivering electrical shocks to restore normal rhythm when necessary.

Fontenot lived with that defibrillator through high school, receiving periodic shocks to reset his weakening heart. Unfortunately, ICDs last between just three and six years, and Fontenot’s condition wasn’t improving, so his physicians decided to place him on the transplant list. He was given a pager to keep with him at all times and told to resume normal activity. Then, on Dec. 16, 1994, he got the call.

“I remember they said they had a heart for me and that I had to get to the hospital,” Fontenot recalls. “I was definitely scared. I remember hoping that the pager would go off, but also not really wanting it to – I was walking around fine and then all it took was that one phone call and I’d be heading into major surgery.”

Fontenot had just turned 18 years old at the time of his first heart transplant, a procedure that couldn’t have gone better. In just three days, he was walking a mile throughout the hospital. His physicians told him that the donor was a 15-year-old, and that the heart would last approximately nine years. No heart lasts forever, and transplanted hearts have an even shorter prognosis due to the plaque buildups caused by the required rejection medication. So in the meantime, Fontenot planned on living. He traveled the country, vacationed in Canada, had two children, raised horses, built custom-made motorcycles for local rap artists, worked at NASA, and partnered in a bakery, decorating cookies and cakes. He would try not to think about what would happen nine years later.

What would happen, however, didn’t occur for another 19 years.

“I remember it was a Sunday night, and I felt like I was drowning every time I tried to lie down, I couldn’t breathe,” Fontenot says. “So I took a Benadryl® and called in sick to work. I thought it was allergies.”

Fontenot returned to work that following Tuesday, but continued to have trouble sleeping, breathing, and ultimately walking. He finally visited an urgent care facility where they determined that not only were his
lungs filled with fluid, but that he was having a heart attack there in the examination room. Once again, Fontenot was rushed to the local hospital where his primary cardiologist stabilized him. Tests revealed that two of his arteries were 100 percent blocked, and a blood clot was sitting behind one of them.

But Fontenot was ready to keep fighting, and so were his physicians. His doctors decided the best place for him was the Center for Advanced Heart Failure at Memorial Hermann Heart & Vascular Institute-Texas Medical Center. He was transported and placed under the care of UTHealth Medical School faculty Pranav Loyalka, M.D., associate chief of the medical division at the center; Igor Gregoric, M.D., chief and program director of the surgical division; Biswajit Kar, M.D., chief and program director of the medical division; Indranee Rajapreyar, M.D.; Sriram Nathan, M.D., director of cardiogenic shock; and Farshad Raissi, M.D.

The team inserted a pump to stabilize his heart, and once again he was placed on the transplant list, but this time he wasn’t allowed to leave with a pager.

“I watched a lot of Netflix,” Fontenot recalls, laughing. “Thirteen weeks’ worth. In fact, that’s what I was doing when Dr. Loyalka called and said they might have a heart for me.”

Fontenot was the 25th person on the priority list for that heart, which meant the 24 people before him were not a match in order for him to receive it.

“I remember Dr. Loyalka saying, ‘Just be prepared.’”

In the early hours of July 1, 2013, Dr. Gregoric made an incision in Fontenot’s chest along the scars from that same surgery nearly two decades earlier. With the help of Manish Patel, M.D., associate professor of the surgical division at the center, who was the procuring surgeon of the donor heart, Fontenot’s breastbone was spread apart, tubes were inserted into his chest, and his blood began pumping through a cardiopulmonary bypass machine. His failing heart was removed and his now-third heart was sewn into place. After all the blood vessels were securely connected, the physicians shocked Fontenot’s new heart into beating.

“His heart was in really bad shape,” Dr. Loyalka says. “Another transplant was really his only option, and although it is rare, it can be very successful.”

Fontenot is now back to living his life – keeping himself busy with work, building bikes, and spending time with his family.

“The key to recovery, the key to longevity, is to just keep going,” Fontenot says. “Don’t let things stop you. You’ve got to want it, you’ve got to go and just take it. Get in the sun, live your life. If I’ve got to go, I’m going to go happy.”

According to Dr. Nathan, however, Fontenot isn’t going anywhere – not for a while.

“He’s recovered very well from his second transplant, and his new heart is in great shape. He’s doing his part to take care of it through diet and medication, and we’re all confident that he’s going to continue to do well for many years to come. He’s truly a transplant success story.”

The Center for Advanced Heart Failure at Memorial Hermann Heart & Vascular Institute - Texas Medical Center celebrates its grand opening Feb. 18, 2014.
D.J. Hayden Plays for His Life — and Wins — After Life-Threatening Injury

On Nov. 6, 2012, just weeks away from the final game of the University of Houston (UH) Cougars’ football season, something went terribly wrong during practice. In a perfect storm, safety Trevon Stewart and defensive back D.J. Hayden both went up to defend a pass at the same time on the practice field, and Stewart’s knee went full throttle into his teammate’s sternum, rupturing Hayden’s vena cava — the main blood vessel that leads to the heart.

“It was a freak accident,” says UH Cougars coach Tony Levine. “It was as unfortunate a situation on a play as I have ever been a part of.”

Near death, 22-year-old Hayden — a preseason All-Conference USA selection and defensive captain for the Cougars — was rushed to Memorial Hermann Texas Trauma Institute, where he underwent emergency surgery to repair the tear. The medical team used 23 units of blood products (red blood cells, plasma, and platelets) during the life-saving procedure, which lasted two and a half hours.

“This injury has never been seen or reported in association with a football injury and is more associated with high-speed motor vehicle injuries,” says Walter Lowe, M.D., University of Houston head team physician and head of orthopaedic programs at the UTHealth Medical School and Memorial Hermann-Texas Medical Center. “The type of injury D.J. had is 95 percent fatal in the field, and we are all very thankful for the coordinated response from the University of Houston trainers, EMS paramedics, and the trauma team at Memorial Hermann Texas Trauma Institute, including trauma surgeon Dr. Ron Albarado; trauma surgeon Dr. Phil Adams; and chief resident Dr. Laura Kreiner.”

Hayden was hospitalized in critical condition following the surgery. During that time, #PRAYFORDJ trended on Twitter and social media as fans and friends sent their prayers and well-wishes.

“We are very fortunate to have some of the nation’s top physicians and medical facilities just minutes away from our campus, and I would like to extend our appreciation to the caregivers at Texas Trauma Institute for their efforts in saving D.J.’s life,” says Coach Tony Levine.

Had D.J.’s transfer been delayed by as little as five minutes, he wouldn’t have survived,” says Dr. Albarado, assistant professor of surgery. “Thanks to someone on the field who followed his gut instincts and called an ambulance because something ‘just didn’t seem right,’ D.J. was given a fighting chance.”

When D.J. was brought in to the operating room, Dr. Albarado maintained temporary control of the bleeding with a single finger, while Dr. Kreiner improved the surgical exposure to the wound to facilitate
safe repair. As an additional safeguard, they called in a second trauma surgeon, Dr. Adams, associate professor of surgery.

“Our team made critical preparations, understanding that we only had one chance at successfully repairing the vein without avulsing the vein completely from the heart,” Dr. Albarado says. “Repair of his vein was like attempting to suture pieces of wet toilet paper together. Too much force – even the slightest misstep – would further damage the vein and result in a rapid death.”

Hayden made it through the surgery and intensive care. Only six days later, he was discharged.

“Looking at the whole course of events and the severity of the injury, D.J. has progressed remarkably well and was out a lot sooner than expected,” says Dr. Lowe, medical director of the IRONMAN Sports Medicine Institute at Memorial Hermann.

Though Hayden missed the remainder of the season – his senior year – he counts his blessings.

“I have a lot to be thankful for – thankful that I’m alive and I made it through the surgery,” Hayden says. “Not to mention, the incredible amount of support I’ve received since the accident.”

On Nov. 24, 2012, UH’s Senior Day, Hayden rejoined his teammates as he and his fellow seniors were honored at Robertson Stadium. In a heartfelt tribute to their injured teammate, all the players on the Houston Cougars football team wore Hayden’s name on the backs of their jerseys.

“I love all of them,” Hayden says. “What they did meant a lot to me. There are no words.”

“We are very fortunate to have some of the nation’s top physicians and medical facilities just minutes away from our campus, and I would like to extend our appreciation to the caregivers at Texas Trauma Institute for their efforts in saving D.J.’s life,” Coach Levine says. “He is a tremendous young man and has been a great asset to our program, both on and off the field. I ask that everyone continue to keep D.J. and his family in their thoughts and prayers.”

Selected as the 12th overall pick in the 2013 NFL Draft, Hayden now is facing challenges on the field as a rookie cornerback for the Oakland Raiders.
Dr. Weltge epitomizes service to the state through delivery of health service and community relationships.
- Nomination letter

WELTGE WINS DISTINGUISHED ALUMNUS AWARD

A rlo Weltge, M.D., ’78, is the 2013 winner of the Distinguished Alumnus Award of The University of Texas Medical School at Houston.

Dr. Weltge is a clinical professor of emergency medicine at the UTHealth Medical School.

Established in 1987, the purpose of the award is to recognize outstanding contributions of alumni in the areas of medical science and education, or the prevention and treatment of diseases, as well as continued interests in the UTHealth Medical School and its students.

“Dr. Weltge epitomizes service to the state through delivery of health service and community relationships,” writes his nominator. “He is always down to earth, friendly, approachable, and supportive.”

Dr. Weltge completed his residency at Baylor College of Medicine and an emergency medicine faculty teaching fellowship with the Emergency Medicine Foundation, American College of Emergency Physicians. He received a master’s of public health degree from the UT School of Public Health.

He joined the UTHealth Medical School faculty in 1989 as the first emergency medicine-boarded physician as the school began developing an emergency medicine residency program.

“I started my clinical practice three months before emergency medicine was recognized as a clinical specialty in September of 1979. Ten years later, Aug. 1, 1989, was to be my first day at the Medical School, but my boss Jim Heffner called me to say, ’Don’t come in, a hurricane is supposed to hit,’” he recalls.

Dr. Weltge also serves as medical director of both the Houston Community College System Program in EMS and the American Medical Response Ambulance Service. He is the founder and served as director of Southeast Texas Emergency Physicians.

Dr. Weltge plays a major role in organized medicine in the county, state, and national levels, culminating in serving as speaker of the House of Delegates for the national American College of Emergency Physicians. He is an active member of the American Medical Association, the Texas Medical Association, TEXPAC, Harris County Medical Society, and the American Heart Association.

“My colleagues from the class of 1978 are doing incredible work that has changed dramatically over the past 35 years. Paula Plummer practices family practice...
medicine in the community as part of the primary care system, which was once a mainstay and is now probably the biggest visible gap in health care today. When George Richardson was learning surgery, reimplantations of extremities were just taking hold — now they are routine; Jonas Garcia now does invasive cardiology through needle insertion in the groin, which for a long time required surgery to open the chest. And the cancer treatments that my wife Janet and I learned — high doses of toxic chemicals — have now moved to designer molecules to interrupt specific pathways and antibody treatments.

Dr. Weltge received the honor during an Alumni Dinner held June 22, 2013, at Trevisio’s.

“I had been a life member of the Alumni Association since graduation, but it wasn’t until I heard Alumni Board President Dr. Marylee Kott talking about the incredible things that the association does to support the school and students, that I fully appreciated its contributions,” he adds.

The University of Texas Medical School Alumni Association is branching out to city-based chapters in an attempt to increase alumni participation and fellowship.

A Dallas chapter of the Alumni Association was officially established in May 2012. Lowell Ku, M.D., ’97, and Shelby Melton, M.D., ’04, are the Dallas chapter co-chairs.

“This arrangement will provide an opportunity for UTHealth Medical School alumni in the Dallas area to meet, get reacquainted with one another, and to develop projects as a group of UTHealth Medical School alumni,” says Derrick Miller, director of alumni relations, adding that there are 857 alumni in the Dallas area.

The Dallas chapter is open to all alumni of the Dallas area. In the first three organizational meetings, approximately 50 alumni have participated.

The Dallas chapter also held a Family Fun Day at the Perot Museum in October.

Miller adds that city-based chapters have been embraced by other medical schools as valuable tools to foster engagement.

“We hope the chapters will encourage alumni to take on leadership roles in their area and become active in the Alumni Association and Medical School projects,” Miller says. “There are many alumni who don’t have the luxury to take off time for Medical School or Alumni Association events held in Houston, but the chapters give them an option to attend alumni events and participate in activities in their area.”

For more information about the Dallas chapter, or other city-based chapters, please contact Miller, Derrick.J.Miller@uth.tmc.edu, or 713.500.5181.
In conjunction with its 50th Anniversary, The University of Texas Graduate School of Biomedical Sciences at Houston hosted a Super Panel and Alumni Reunion Nov. 8, 2013, featuring several Distinguished Alumni honored by the school.

Four GSBS alumni stars comprised the panel on “Finding your Passion…Personal Catalysts and Steps to Career Success”:

**Hugo Barrera Saldana, Ph.D. (1982/Saunders):** A specialist in science and technology commercialization (IC²Institute-UT-Austin and ITESM, 1999). In Latin America, he pioneered molecular diagnosis of several diseases; clinical trials on cancer gene therapy (prostate cancer); and internationally competitive research on the regulation, evolution, dysfunction, and biotechnological use of growth hormone genes. He was named GSBS Distinguished Alumnus in 1998.

**Cherie Butts, Ph.D. (2003/Freedman):** Associate director of immunology research at Biogen Idec Inc., a biotechnology company in Cambridge, Mass., her work focuses on developing drugs for autoimmune and fibrotic conditions.

**Eugene Gerner, Ph.D. (1974/Humphrey):** Highly regarded for his work in gastrointestinal cancer, Dr. Gerner is formerly the director of the GI Cancer Program at the University of Arizona Cancer Center and principal investigator of a GI SPORE. Currently professor emeritus, Department of Cellular and Molecular Medicine at the University of Arizona, he holds several patents related to cancer prevention therapies. He co-founded the company Cancer Prevention Pharmaceuticals Inc. (CPP) to bring cancer prevention into clinical practice and serves as chief scientific officer at CPP. He was named GSBS Distinguished Alumnus in 2003.

**Cathy Wicklund, M.S., C.G.C. (1993/Hecht):** Director of the Graduate Program in Genetic Counseling at Northwestern University. She served on the Board of Directors of the National Society and is an advocate for the Genetic Information Non-Discrimination Act and the recognition of genetic counselors as providers under the Social Security Act. She is also a member of the Institute of Medicine Roundtable on Translating Genomic-Based Research for Health and the Discretionary Advisory Committee on Heritable Disorders in Newborns and Children. She was named GSBS Distinguished Alumna in 2010.

Three GSBS Alumni were featured at the 50th Anniversary Alumni Reunion:

Two expert alumni panels highlight the Graduate School’s anniversary celebration.
Suzanne Fuqua, Ph.D., (1982/Naso): A 1982 graduate, Dr. Fuqua is widely recognized for her pioneering work on hormonal resistance in breast cancer. Her lab identified variant estrogen receptors in breast cancer tumors and has linked these mutations to hormone resistance and breast cancer progression by demonstrating their consequences in altering estrogen-binding and cell responsiveness in model systems. Dr. Fuqua is an associate director of cancer education at Baylor College of Medicine and also has made seminal observations on novel hormone therapy resistance mechanisms and metastatic drivers in breast tumor progression. She was named GSBS Distinguished Alumna in 2007.

Michael McClure, Ph.D., (1970/Hnilica): As chief of the Reproductive Sciences Branch, National Institute of Child Health and Human Development, Dr. McClure led a broad national NIH research program in the Reproductive Sciences. His individual program focus was on the field of reproductive genetics and reproductive immunology. He played a major role in NICHD’s developing the NIH science policy related to cloning. He retired in 2003 as chief, Organs and Systems Toxicology Branch, Division of Extramural Research and Training, National Institute of Environmental Health Sciences, NIH. He was named GSBS Distinguished Alumnus in 2000.

Danny Welch, Ph.D., (1984/Nicolson): An internationally recognized leader in the field of cancer metastasis, Dr. Welch is professor and founding chair at the University of Kansas in the department of cancer biology. He is best known for his discovery of 6 of the 34 known metastasis-suppressor genes. Dr. Welch and his associate J. H. Lee are inventors of and hold the international patent for KISS1, a metastasis-suppressor gene. Recently, with colleague Scott Ballinger, he developed the MNX mouse, which provides a new way to study nuclear-mitochondrial gene interactions. He was named the GSBS Distinguished Alumnus in 2008.

GSBS alumni Michael McClure, Ph.D., Suzanne Fuqua, Ph.D., Danny Welch, Ph.D., and moderator Eric Solberg, M.S. (associate vice president, Academic & Research Affairs, UTHealth) participate in a panel discussion Conversations about Past/Present/Future in the Biomedical Sciences during the 2013 Alumni Reunion Nov. 8 at Asia Society Texas Center.
**ANESTHESIOLOGY**

The Department of Anesthesiology is highly committed to achieve and demonstrate excellence in the clinical care of patients and in academics both through innovative research and by offering a stellar educational program. Our diverse faculty provide clinical expertise at multiple clinical sites in both ambulatory and inpatient settings, including Memorial Hermann-Texas Medical Center, Memorial Hermann Ambulatory Surgery Center, the Memorial Hermann Heart and Vascular Institute, as well as Lyndon B. Johnson General Hospital. Anesthesiology is a technology driven field, and we have been able to apply the latest technological advances in the care we provide for our patients.

Anesthesiology faculty members are respected for their dedication to clinical training, education, and research. This past year, we had the highest acceptance of scientific abstracts and presentations at the American Society of Anesthesiologists meeting in the history of this department. The number of research publications generated by the department has increased as well.

Clinical research is being performed in areas of airway management, coagulation abnormalities, as well as cardiac, pediatric, obstetric, regional, and trauma anesthesia. Additionally, we have basic science faculty dedicated to research related to the development of pharmacological strategies to improve endothelial dysfunction in animal models of inflammation and hypertension. Our research team is also assessing the mechanisms of chronic edema and chronic inflammation during prolonged heart failure. Lastly, our team is currently testing a new medical technology “Low Intensity Laser Ablation” to create lesions in target issues that produce pain.

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**BIOCHEMISTRY AND MOLECULAR BIOLOGY**

As a basic science department in a research intensive medical school, the major mission of the Department of Biochemistry and Molecular Biology (BMB) is to conduct innovative and important biomedical research. BMB is host to a diverse array of multidisciplinary research programs ranging from basic biomedical research in cell biology, structural biology, genetics, immunology, microbiology, and neurobiology to preclinical and translational research in pulmonary disease, cardiovascular disease, hypertension, visual disorders, and sickle cell anemia. BMB is home to two research centers, the Center for Membrane Biology and the Structural Biology Center, which represent areas of research excellence in the department. The interdisciplinary approaches taken by our faculty provide meaning to the term “molecular medicine.”

Major accomplishments this year include:

- Research by two members of our Structural Biology Center, Irina Serysheva and Lei Zheng, resulted in published papers in *Structure* and in the *Proceedings of the National Academy of Sciences*, respectively. Their research deals with membrane proteins that regulate calcium flux in cardiac and skeletal muscle cells.
- The National Science Foundation homepage featured research from the laboratory of John Spudich, director, Center for Membrane Biology. The NSF article highlighted the seminal role of basic research conducted in his laboratory on microbial sensory rhodopsins in the development of optogenetics, a new biotechnology that has revolutionized research on neural circuitry.

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**DEPARTMENT PROFILES**

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<th>Carin A. Hagberg, M.D.</th>
<th>Rodney E. Kellems, Ph.D.</th>
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CARDIOTHORACIC AND VASCULAR SURGERY

Our faculty care for patients at Memorial Hermann Heart & Vascular Institute and are world leaders in the treatment of heart and blood vessel problems, including heart valves, heart blood supply, and blood circulation throughout the body.

Our innovative techniques have resulted in critical advancements in the repair of ballooning blood vessels – preventing rupture and significantly improving outcomes. Surgeons of the department have been leaders in the field of aortic surgery for three decades, developing and perfecting all aspects of aortic disease management. Procedures involve clinical investigation with the goal of optimizing techniques of repairs of the ascending, transverse, arch, and thoracoabdominal aorta. Refinement in techniques are being investigated to provide multiorgan protection. Also we have first-class thoracic surgeons dedicated to thoracic diseases, benign and malignant esophageal, lung, and mediastinal disease.

We are actively involved in the NIH-funded specialized center grant (SCCOR) in collaboration with Dr. Dianna Milewicz in the Department of Internal Medicine. Faculty in our department collaborate actively with the educational and research programs of the Medical School’s Center for Clinical Research and Evidence-Based Medicine in teaching and mentorship programs as well as in the administration of the NIH-funded K12 program in connection with the Center for Clinical and Translational Sciences.

DERMATOLOGY

Dermatology is an integrated department between the Medical School and MD Anderson Cancer Center. Activities also involve Memorial Hermann-Texas Medical Center and Harris Health System.

The department was ranked as one of the top eight dermatology clinical centers of excellence in the nation according to Medical Economics and Dermatology Times. The combined research funding is at $2.5 million per year, particularly emphasizing pediatric dermatology, cutaneous lymphoma, skin cancer, dermatopathology, and skin molecular virology.

There are 22 salaried faculty, 18 dermatology residents, a surgical dermatology fellow, a dermatopathology fellow, and two clinical research fellows. The training programs are extremely competitive. We are one of the larger dermatology programs in the nation.

Senior faculty have held major national offices, such as president of the American Board of Dermatology, president of the American Society of Dermatopathology, and president of the Society for Pediatric Dermatology.

Electives for medical students are popular among students from our own school and outside institutions.

Dermatology operates a very busy clinical dermatopathology and immunofluorescence laboratory for processing patient biopsies.
The Department of Emergency Medicine is proud of its commitment to outstanding clinical care, educational excellence, and academic rigor. Education of the next generation of leaders in emergency medicine will continue to be a core pillar of our mission. With our third year of 18 residents arriving this past summer, we have become one of the largest training programs in the country. With our strong hospital partners and core faculty we offer an unparalleled training experience—unmatched in Texas and on par with the best in the nation. We currently support fellowships in Emergency Medical Services, Informatics, Ultrasound, and Global Health.

In an effort to promote collaboration among our faculty and our colleagues at UTHealth, we focus our department’s research on the clinical strengths of our emergency departments. To that end our primary research foci include: the acute care of the injured heart, brain, and vascular system; public health and prevention research; research involving the medical or traumatic presentation of shock; and research involving health informatics and emergency medicine processes.

The heart of any clinical department will always be the care it provides the patients who entrust their health and life to our doctors. We continue to strive for clinical excellence with our quality assurance process and push to deliver state-of-the-art care in a compassionate and patient-centric delivery model. We provide clinical emergency expertise at Lyndon B. Johnson General Hospital, Memorial Hermann-Texas Medical Center, Children’s Memorial Hermann Hospital, Memorial Herman Sugar Land Pediatric, and Memorial Hermann Memorial City Pediatric Emergency centers.

The Department of Diagnostic and Interventional Imaging supports a broad spectrum of healthcare needs and provides the educational and research initiatives of a radiology department at the forefront of modern medicine.

This is made possible through our affiliation with our teaching hospitals, Memorial Hermann-Texas Medical Center and the Lyndon B. Johnson General Hospital. Our department interprets more than 585,000 radiological procedures per year. Providing sub-specialized quality service to our patients and their referring physicians is actively maintained through a high-profile performance improvement program.

Teaching is fundamental to our mission, and we are proud of the well-recognized qualifications of our faculty. Our training programs not only capitalize on the educational opportunities at our affiliated teaching hospitals but also benefit by sharing residency and fellowship training programs with other internationally recognized radiology departments, including MD Anderson Cancer Center, St. Joseph’s General Hospital, Texas Children’s Hospital, and St. Luke’s Hospital. Together we offer a premier educational environment staffed by an internationally recognized faculty.

World-class research in MR, PET, nuclear medicine, and ultrasound are hallmarks of our department, with many of our basic science faculty and clinical faculty achieving international status as leaders in their fields.
FAMILY AND COMMUNITY MEDICINE

We have a diverse faculty and staff committed to excellence in patient care, teaching, research, and community service.

Our faculty are involved in a wide range of activities, including medical student education and family medicine residency training.

We offer multiple sites for comprehensive family care, including screening and prevention of disease and ambulatory procedures, such as flexible sigmoidoscopy and colonoscopy, exercise stress testing and exercise prescription, vasectomy, and skin procedures. Our faculty and residents provide low-risk maternity care, care for newborns and children, as well as adult medical care covering a wide spectrum of common diseases. Several of our faculty have special expertise in geriatrics and sports medicine. Faculty and residents provide inpatient management of patients at both Memorial Hermann-TMC and LBJ General Hospital.

One of our residency program’s strengths is its training of physicians to care for urban underserved populations. We also emphasize the bio-psycho-social approach to medical care. Our residents also are trained to use the transtheoretical model of behavior change to encourage their patients to make healthy lifestyle changes.

Our Urban Program coordinates medical services, educational activities, research, community outreach, and health profession interdisciplinary endeavors at the Harris Health community health centers.

We deliver high quality patient care at multiple sites in both ambulatory and inpatient settings that include UT Physicians and Harris Health locations.

INTEGRATIVE BIOLOGY AND PHARMACOLOGY

The Department of Integrative Biology and Pharmacology (IBP) is interested in the cell biology, physiology, and pharmacology of cell regulation and communication. Our major research themes include the molecular mechanisms and spatiotemporal dynamics of membrane signaling; intracellular and metabolic signaling; the biology and physiology of cell-cell interactions; and the use of computational, structural, and systems approaches to decipher signaling networks. These efforts are aimed at understanding how normal and abnormal cell function translates into whole animal physiology and pathophysiology, and exploring the molecular pharmacology of existing and novel therapeutics.

In this context, IBP has research programs in cancer cell biology, cardiovascular biology, tissue regeneration and plasticity (especially in nerve and muscle), and neuronal signaling in injury, inflammation, and pain. IBP faculty teach Physiology and Pharmacology to medical students. We run an active graduate studies program in Cell and Regulatory Biology, and we participate in the University Centers for Membrane Biology and Clinical and Translational Sciences within the Medical School and in several training grants including those in Pharmacological Sciences and Computational Cancer Biology.

Carlos A. Moreno, M.D., M.S.P.H.

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John F. Hancock, M.A., M.B., B.Chir., Ph.D., Sc.D.

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INTERNAL MEDICINE

The Department of Internal Medicine strives to improve the quality of health care through excellence in the education of students, residents, physicians, and the public; the advancement of biomedical knowledge through discovery, integration, and translation to the clinical setting; and the provision of state-of-the-art comprehensive, compassionate, and accessible patient care.

The department has undergone exponential growth over the last few years in basic and clinical research as well as clinical patient care to become one of the largest academic departments of medicine in the country.

The scope of our department is best illustrated through our 15 divisions: Cardiovascular Medicine; Center for Clinical and Translational Sciences; Critical Care; Endocrinology and Diabetes; Gastroenterology and Hepatology; General Internal Medicine; Geriatric and Palliative Medicine; Hematology; Hyperbaric Medicine; Infectious Diseases; Medical Genetics; Oncology; Pulmonary and Sleep Medicine; Renal Diseases and Hypertension; and Rheumatology.

The department’s clinical services span the continuum of primary care to subspecialty care. Excellent clinical care is provided at UT Physicians-Texas Medical Center, Bellaire, Sienna, Cinco Ranch, and Bayshore; Memorial Hermann-Texas Medical Center; Memorial Hermann Northeast; Memorial Hermann Southeast; Memorial Hermann Southwest; TIRR Memorial Hermann; and Lyndon B. Johnson General Hospital.

MICROBIOLOGY AND MOLECULAR GENETICS

The faculty of the Department of Microbiology and Molecular Genetics are highly committed to excellence in research and education. Members’ diverse research interests and expertise are related to the biology, pathogenesis, and molecular genetics of a wide variety of microbes. Investigations of disease-causing bacteria, fungi, and parasites will facilitate identification of key microbe and host factors that are associated with altered metabolism and disease. The department has undergone a significant expansion within the past year with the addition of three new assistant professors:

- Dr. Nicholas De Lay, role of small RNAs in bacterial behaviors related to pathogenesis;
- Dr. Nayun Kim, mechanisms of genomic instability that affect efficacy of drug treatment regimens; and
- Dr. Jiqiang Ling, mechanisms of mistranslation with applications to synthetic biology and treatments for infectious and neurodegenerative diseases.

In addition to its strong research program, the department offers the Medical Microbiology course taken by first-year medical students and is home to the Graduate Program in Microbiology and Molecular Genetics, a model program of the Graduate School of Biomedical Sciences.
NEUROBIOLOGY AND ANATOMY

Neuroscience is considered to be one of the last frontiers of the biomedical sciences. The Department of Neurobiology and Anatomy is committed to being at the forefront of these discoveries.

One of the largest neuroscience departments in North America, the department’s missions includes biomedical research in cellular and molecular neuroscience, computational neuroscience, and systems and cognitive neuroscience. The department has particular strengths in the areas of learning and memory, and vision. Department faculty also teach medical and graduate courses in neuroscience, gross anatomy, developmental anatomy, as well as some dental courses.

The department manages the Neuroscience Research Center, the W.M. Keck Center for the Neurobiology of Learning and Memory, the Willed Body Program and Human Structure Facility, and several of the Medical School’s core research facilities.

Research in Dr. Michael Beierlein’s laboratory has shown that the neurotransmitter GABA – usually thought to act as an inhibitory transmitter throughout the brain – excites neurons in the thalamus, a brain area important for the processing of sensory information. Insights gained from these studies will be critical to understanding certain forms of epilepsy that are linked to thalamic dysfunction.

Dr. Valentin Dragoi was awarded the NIH Director’s Pioneer Award, and he published three new groundbreaking articles on population coding in visual cortical neuronal networks.

Dr. Andrey Tsvetkov recently joined the department from the laboratory of Dr. Steven Finkbeiner in The Taube-Koret Center for Huntington Disease Research at the University of California, San Francisco.

NANOMEDICINE AND BIOMEDICAL ENGINEERING

The objective of the Department of NanoMedicine and Biomedical Engineering is focused on inter-disciplinary research to combine nanomedicine, biomedical engineering, and computational sciences to develop novel therapeutic and diagnostic platforms for combating diseases including cancer, cardiovascular diseases, and infectious diseases. In partnership with UT MD Anderson Cancer Center, a number of major initiatives are being brought together in the South Campus Center for Advanced Biomedical Imaging research building, including a new multi-institutional NCI Center on NanoMedicine and a GE, UTHealth, and MD Anderson partnership to create a new, state-of-the-art imaging center.

A NanoMedicine and Biomedical Engineering Scholarly Concentration is designed to offer students the opportunity to learn emerging new technologies in biomedical nanotechnology and engineering.

A series of cross-appointments with faculty in other departments, divisions, and units and adjunct appointments with faculty in other collaborating institutions through The Alliance for NanoHealth and other Texas Medical Center institutions are utilized to enhance multidisciplinary research and expand the available opportunities for the training and teaching of students.

Several ongoing research projects include:

- Injectable NanoVectors for Directed (Targeted personalized) Therapeutics
- Novel Targeted Imaging Technologies
- Early Detection of Disease from Blood Proteomic Signatures
THE VIVIAN L. SMITH DEPARTMENT OF NEUROSURGERY

We are currently the largest neurosurgery group in Houston in terms of numbers of faculty, NIH grants received, and total research expenditure. We are the #1 neurosurgery program in terms of market share. We also have started robust educational programs.

Our clinical program, run through the Mischer Neuroscience Institute of Memorial Hermann in collaboration with Neurology, has grown significantly in the past four years, more than doubling in size. At the same time, our quality has improved. Our mortality rates are below the benchmark of our peers in the University Health-System Consortium (UHC). In addition, complication rates at the MNI are also below national standards as compared to UHC and Healthgrades organizations.

We are proud of our educational activities. Currently, about a quarter of UT medical students rotate through neurosurgery during the third year, a dramatic increase from prior years. The Neurosurgery Residency Training Program was begun in July 2008. In July 2011, we were given an unconditional 5-year certification after review, and our resident complement was approved to increase to 2 per year (for a total of 14). Most neurosurgery residencies nationally support 1 resident per year.

We have three fellowships, in cerebrovascular and skull base surgery, neurocritical care, and endovascular neurosurgery.

Research is a high priority for us. In 2010, we were #11 in NIH grant funding among neurosurgery departments nationally. We have 9 PhD faculty, and many clinicians are involved in research projects. Current direct spending exceeds $5 million per year.

THE VIVIAN L. SMITH DEPARTMENT OF NEUROSURGERY

James C. Grotta, M.D.

Faculty 43
Residents & Fellows 29
Research $13,015,747
Patients 28,897

Dong H. Kim, M.D.

Faculty 37
Residents & Fellows 14
Research $3,602,548
Patients 1,253

NEUROLOGY

The mission of the Department of Neurology is to provide a comprehensive learning environment for future neurologists, perform groundbreaking research in the field of neurology, and provide cutting-edge care for patients who cross through the thresholds of our clinical sites.

All of our specialty programs focus on the clinical applications of the latest neurological research. The Stroke Program has been continuously funded to translate new therapies from their laboratories to bedside testing and is a national leader in treatment and research of acute stroke. The Multiple Sclerosis Research Group focuses on fundamental and applied research approaches in neuroimmunology and advanced magnetic resonance imaging to better understand the pathogenesis and treatment of multiple sclerosis. The Neuromuscular Program is focused on providing the latest state-of-the-art clinical care to patients with neuromuscular disorders. The Texas Comprehensive Epilepsy Program and its Epilepsy Monitoring Unit at Memorial Hermann-Texas Medical Center offer a comprehensive diagnostic and therapeutic program for pediatric and adult epilepsy patients and their physicians. The movement disorders program (UT MOVE) also embodies a comprehensive diagnostic and therapeutic program for patients with Parkinson's disease and similar disorders, and both the movement and epilepsy programs collaborate with our neurosurgical colleagues to treat refractory cases. Our newest program is in cognitive disorders and dementia and includes both a multidisciplinary clinical diagnostic and treatment program and groundbreaking research in the Mischer Neuroscience Institute. Finally, our diagnostic neurology group of expert clinicians is always available for evaluating and treating new patients referred for any sort of neurological condition.
OBSTETRICS, GYNECOLOGY, AND REPRODUCTIVE SCIENCES

Our department consists of two divisions: General Obstetrics & Gynecology and Maternal-Fetal Medicine. Our physicians provide coverage at Memorial Hermann-Texas Medical Center and Lyndon B. Johnson General Hospital. Faculty members are involved in patient care, education, research, and community service.

Our faculty offer special expertise to patients in all aspects of women’s health, including normal and high-risk pregnancies, reproductive endocrinology and infertility, gynecological oncology, and general gynecology. We offer our patients minimally invasive techniques such as laparoscopy, hysteroscopy, and robotic surgery; urogynecology; hormonal and menopausal management; a full range of contraceptive options, including intrauterine devices, subcutaneous contraceptive implants, and hysteroscopic sterilization; as well as well-woman and preventive health care.

As a university, we have a commitment to medical student and resident physician education. We have two fully accredited residency programs in obstetrics and gynecology and offer a fully accredited three-year fellowship in maternal-fetal medicine.

In the Division of General Obstetrics and Gynecology, our goal is to provide superior medical care for women of all ages.

The Division of Maternal-Fetal Medicine provides care in several forums.

RUIZ, M.D., DEPARTMENT OF OPHTHALMOLOGY AND VISUAL SCIENCE

The Ruiz, M.D., Department of Ophthalmology and Visual Science provides a full complement of inpatient and outpatient clinical services through its primary teaching facilities: the Cizik Eye Clinic, Memorial Hermann-Texas Medical Center, Children’s Memorial Hermann Hospital, Lyndon B. Johnson General Hospital, Settegast Community Health Center, Baytown Community Clinic, and Acres Home Community Health Center.

The ophthalmic subspecialties represented in the Cizik Eye Clinic include ophthalmic plastic, reconstructive, and orbital surgery; corneal and external disease, refractive surgery, glaucoma, retina, vitreous, and uveitis; pediatric ophthalmology; and neuro-ophthalmology. All of the physicians at the Cizik Eye Clinic are faculty members in the department, are board certified by the American Board of Ophthalmology, and are on the medical staffs of numerous facilities, most notably that of Memorial Hermann-Texas Medical Center.

In addition to clinical care, ophthalmology and visual science faculty are at the forefront of research into anatomy and physiology of the eye as well as the causes and treatments of ocular disease. The department is known as a leading center for the design and development of clinical trials in ophthalmology.

The Department of Ophthalmology and Visual Science is involved in the education of undergraduate, graduate, and post-graduate students as well as residents and fellows in a variety of fields of medicine.
ORTHOPAEDIC SURGERY

The Department of Orthopaedic Surgery continues to grow while fulfilling our mission to provide expert medical care in a professional, effective, and cost-conscious manner as we encourage a multi-disciplinary team approach to address the needs of the patient as a whole person.

To accomplish this goal, we engage our students, residents, and faculty in providing both medical care and health education to members of our community; we stimulate and foster scholarly research in both basic and applied medical science as we continue to create and evaluate new knowledge, particularly as it relates to the cause, prevention, and treatment of musculoskeletal conditions; we provide the best possible educational experience for both students and faculty as we empower them to effectively apply their orthopaedic knowledge; and we will seek to develop in our students, faculty, and staff those qualities that will be critical to leadership as we meet the challenges of healthcare in the 21st century—integrity, professionalism, scholarship, collegiality, creativity, and compassion.

Our research mission is to apply basic science and implement it into the clinical setting to better serve patients. Our faculty continue to focus on funding for their research and making advances in the field of musculoskeletal medicine and orthopaedic surgery. Our research facilities include the Orthopaedic Biomechanics Laboratory, a Bone Histomorphometry Laboratory, and a Dual Energy X-Ray Absorptiometry (DXA) lab.

Our department comprises 52 faculty with training and experience in joint replacement, spine, oncology, trauma, sports medicine, shoulder and elbow, hand, foot and ankle, and pediatrics.

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OTORHINOLARYNGOLOGY - HEAD AND NECK SURGERY

The Department of Otorhinolaryngology–Head and Neck Surgery focuses on the care of patients with complex diseases and disorders of the ears, nose, and throat. The department’s full-time faculty members provide world-class patient care and participate in a variety of academic activities for education and research. Their knowledge and expertise has earned them regional, national, and international recognition.

The Department of Otorhinolaryngology-Head & Neck Surgery’s mission is to provide the best possible ear, nose, and throat care for our patients. Patient care is provided at Memorial Hermann Medical Plaza, Memorial Hermann-Texas Medical Center, and Children’s Memorial Hermann Hospital.

Specialized programs within the department include the Texas Sinus Institute, the Texas Skull Base Physicians, and the Texas Voice Performance Institute. In addition, the department has established programs for facial plastic surgery, pediatric ENT, otology, ENT sleep disorders, and head and neck surgery.

The department sponsors a robust educational program, which includes an otolaryngology residency training program as well as two clinical fellowships (rhinology and facial plastic surgery). The department’s CME programs include Lone Star Rhinology, Otorhinolaryngology Frontiers, Texas Hill Country ENT Symposium, and departmental grand rounds. In addition, the department publishes ORL Progress Notes.

Physicians from the department perform clinical and basic science projects since the faculty members strongly believe that the department’s research efforts drive the innovation necessary to provide tomorrow’s advances.

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PATHOLOGY AND LABORATORY MEDICINE

The goal of the Department of Pathology and Laboratory Medicine is to combine the traditional values of academic pathology – excellence in service, teaching, and research – with innovative approaches to the new challenges of medicine and science. We strive to become a model of excellence in the changing world of medicine.

The department includes 56 full-time clinical and research faculty as well as many joint appointment, part-time, and adjunct faculty.

Clinical and basic research are major aspects of the department’s programs. Almost all faculty are engaged in research with the aim of discovering new knowledge and/or developing ways to apply new knowledge to improve diagnosis and management of disease.

Centers and facilities include the Imaging Core Lab, the Chemical Immunology Research Center, the Treponema Molecular Genetics Server, the Electron Microscopy Laboratory, and Research Training in the Molecular Basis of Infectious Disease.

The Outreach Laboratory is fully accredited and staffed by pathologists with subspecialty expertise in many areas. Our goal is to provide the specialized expertise of the UT pathologists to practicing physicians in an efficient, cost-effective, and user-friendly manner.

The department directs a fully accredited residency training program, is extensively involved in the Medical School curriculum, and plays an active role in the training of graduate students in the affiliated Graduate School of Biomedical Sciences.

Our teaching hospitals provide a diverse patient population and exposure to a wide spectrum of human disease.

PEDIATRIC SURGERY

The Division of Pediatric Surgery at The University of Texas Medical School was established in 1973 under the direction of Dr. Benjy Brooks, the first female pediatric surgeon in the country. The Division of Pediatric Surgery became part of the Department of Pediatric Surgery in 2007. The Department has 7 divisions: General & Thoracic Surgery, Neurosurgery, Plastic & Craniofacial Surgery, Cardiovascular Surgery, Acute Care Practitioners, Urology, and Regenerative Medicine. Our divisions are composed of outstanding clinicians and researchers whose skills and expertise cover all major areas of pediatric surgery and different fields of scientific investigation.

We provide educational opportunities for students and residents in many areas. There is also a training program in pediatric surgery. The goal of the pediatric surgery residency training program is to prepare residents to become safe, qualified, and board-certified pediatric surgeons and to be the teachers, researchers, and future leaders in the field of pediatric surgery.

The UT pediatric surgical team partners with the Children’s Memorial Hermann Hospital (CMHH), the Children’s Cancer Hospital at MD Anderson, Harris Health/LBJ Hospital, and Woman’s Hospital. We offer emergency and continued care for pediatric trauma patients from our Level 1 trauma facility based at CMHH.

Our research programs include multiple Phase I and Phase II clinical trials and research in cellular therapies, gut function, and hospital safety.
**PEDIATRICS**

The mission of Department of Pediatrics is to provide the highest quality of medical care; to advance the knowledge in biomedical and behavioral sciences through the expansion of our research programs; and to provide excellence and innovation in the training of students, residents, fellows, and physicians.

As one of the sites of the National Institutes of Health Multicenter Neonatal Intensive Care Network grants, our faculty have contributed to a variety of major advances in the care of newborn infants. The department also has a Pediatric Research Center whose investigators are involved in clinical, basic, and translational research.

The department’s specialized centers include the Center for Clinical Research and Evidence-Based Medicine, which promotes high-quality clinical research to increase the public’s healthy years of life. The goal of our Children’s Learning Institute is to be the pre-eminent source for proven clinical and educational programs covering early childhood through late teens. The department also directs the Forensic Assessment Center Network whose mission is to correct the disparities in Texas in the availability of quality medical assessment for suspected child abuse and neglect victims and to improve the outcomes for all Texas child abuse victims.

Fellowships are offered in the disciplines of Adolescent Medicine, Pediatric Cardiology, Infectious Diseases, Interventional Pediatric Cardiology, Critical Care, Gastroenterology, Neonatology, Nephrology, Pulmonology, and Endocrinology.

First-rate inpatient care is provided at Children’s Memorial Hermann Hospital, Lyndon B. Johnson General Hospital, MD Anderson Cancer Center, and Shriner’s Hospital.

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**PHYSICAL MEDICINE AND REHABILITATION**

The Department of Physical Medicine and Rehabilitation (PM&R) is dedicated to providing outstanding healthcare in the areas of musculoskeletal and pain medicine, electrodiagnosis, and rehabilitation of persons with spinal cord injury, traumatic brain injury, stroke, multiple sclerosis, and other neurologic and medical conditions, in Houston and the surrounding community.

We are dedicated to the training, education, and research in these areas in cooperation with TIRR Memorial Hermann, Memorial Hermann-Texas Medical Center, and the Lyndon B. Johnson General Hospital.

The department is a member of the PM&R Alliance of The University of Texas Medical School and Baylor College of Medicine, which is a unique and successful arrangement between the PM&R departments of two medical schools. Established in 1996, the PM&R Alliance aims to share resources in education and research. It is committed to providing the highest quality of graduate and postgraduate fellowship training for physiatrists.

Research at the UTHHealth Motor Recovery Laboratory is dedicated to discovering novel methods of enhancing functional recovery from neurological disorders, such as stroke, spinal cord injury, and traumatic brain injury. Specific research includes robotic rehabilitation, non-invasive brain stimulation, neural-machine interfaces, myoelectrics, and spasticity management.

We are also an integral part of the federally-funded Model Systems of Care for both Traumatic Brain Injury and Spinal Cord Injury based at TIRR Memorial Hermann. In addition, faculty members are recognized leaders in international and national PM&R and multi-specialty organizations and have been strong advocates for persons with disabilities.
PSYCHIATRY AND BEHAVIORAL SCIENCES

The Department of Psychiatry and Behavioral Sciences is dedicated to the mission of education, research, and patient care.

Our educational programs train students, residents, and fellows of today to become the mental healthcare leaders of tomorrow – whether in public or private sectors, in solo or group practice, as researchers, educators, or clinicians.

Our faculty and staff are at the forefront of the exploration of the causes and treatments of mental illnesses, with a total of over $6 million in grant support. We have centers focused on both mood disorders research and addiction research. In addition, our faculty members have a wide variety of mental health research interests that they pursue in conjunction with their clinical and educational involvement with the department.

The Department of Psychiatry and Behavioral Sciences provides innovative approaches to the treatment of patients in public and private hospitals, including specialty units at Harris County Psychiatric Center that serve several unique patient populations, from those with mood disorders to those with schizophrenia. We also have ambulatory care programs. Our skills and technology are balanced with compassion and respect for the patients we serve.

We make the mental healthcare of the community a priority. We reach out to the community by providing educational programs and supporting the public service activities of our faculty and staff who volunteer in many capacities for community-based professional and mental health advocacy organizations.

SURGERY

The Department of Surgery and its divisions are committed to excellence in patient care, innovative research, and mentoring the next generation of surgeons.

Our divisions include Acute Care Surgery, General Surgery, Immunology and Organ Transplantation, Minimally Invasive and Elective General Surgery, Plastic and Reconstructive Surgery, and Urology.

Our location within the Texas Medical Center, the largest medical center in the world, gives our surgeons, researchers, and residents unique opportunities for collaboration and clinical experience.

Our department offers residency programs in General Surgery, Plastic and Reconstructive Surgery, Urology, and Colon and Rectal Surgery. Fellowships are offered in Surgical Critical Care, Trauma Research, Female Urology and Urodynamics, Minimally Invasive Surgery, Renal Transplantation, and Plastic and Burns.

The Department of Surgery and its divisions are involved in collaborative research efforts throughout the Texas Medical Center, including the Center for Translational Injury Research, the Trauma Research Center, and Nutritional Research.

Excellent clinical services are provided at Memorial Hermann-Texas Medical Center, Lyndon B. Johnson General Hospital, St. Luke’s Episcopal Hospital, MD Anderson Cancer Center, Triumph Hospital, Park Plaza, Spring Branch Medical Center, TIRR Memorial Hermann, UT Physicians at Bellaire, Christus St. Catherine’s, Healthsouth, Pedi Woodlands Clinic, Smith Tower, Texas Liver Center, Twelve Oaks Medical Center, Ambulatory Surgery Center, and Bayshore Medical Center.
Six faculty members of the UTHealth Medical School were elected to The University of Texas Academy of Health Science Education, an organization of distinguished scholars recognized for their teaching excellence. They are: Michael Blackburn, Ph.D., professor of biochemistry and molecular biology and dean of the Graduate School of Biomedical Sciences at Houston; Bryant Boutwell, Dr.P.H., the John P. McGovern Professor of Oslerian Medicine in the McGovern Center for Humanities and Ethics; Gerard Francisco, M.D., chair of the Department of Physical Medicine and Rehabilitation and chief medical officer and interim co-director of the Brain, Injury and Stroke Program at TIRR Memorial Hermann; Jacqueline Hecht, Ph.D., professor of pediatrics and director of the Pediatric Research Center; Evan Pivalizza, M.D., professor of anesthesiology and vice-chair of academic affairs in the department; and Cynthia Santos, M.D., professor of psychiatry and behavioral sciences and training director for the Child and Adolescent Psychiatry Fellowship Program.

Baylor College of Medicine honored Eugene Boisaubin, M.D., professor of internal medicine, with its Lifetime Achievement Award. The award is presented to alumni “whose lifelong pursuits have achieved the zenith of accomplishment and serve as an inspiration to others.”

Patricia Butler, M.D., vice dean for educational programs, was named to the Liaison Committee on Medical Education (LCME) for a three-year term as an American Medical Association (AMA)-appointed professional member. The LCME is the nationally recognized accrediting authority for medical education programs leading to the MD degree in the United States and Canada and is sponsored by the Association of American Medical Colleges and the AMA.

Dean Giuseppe Colasurdo, M.D., was named the sole finalist for the presidency of The University of Texas Health Science Center at Houston Sept. 26, 2012, by The University of Texas System Board of Regents. Dr. Colasurdo had served as the interim president, and in 2007 became dean and H. Wayne Hightower Distinguished Professor in the Medical Sciences at the UTHealth Medical School.

Brian Davis, Ph.D., was named director of the Institute of Molecular Medicine’s Center for Stem Cell and Regenerative Medicine. Holder of the C. Harold and Lorine G. Wallace Distinguished University Chair, Dr. Davis’ research is focused on gene editing in stem cells utilizing homologous recombination and/or DNA repair processes to restore an endogenous mutant gene sequence to the corrected normal sequence in autologous stem cells obtained from patients with inherited genetic disease.
Carmel Dyer, M.D., Roy M. and Phyllis Gough Huffington Chair in Gerontology, was named chief of staff for Lyndon Baines Johnson General Hospital (LBJ), part of the Harris Health System, and associate dean for Harris County Programs. Director of the Division of Geriatric and Palliative Medicine, Dr. Dyer is the fourth chief of staff in the hospital’s history.

Mark Farnie, M.D., associate professor of internal medicine and pediatrics, was the recipient of the Herbert L. and Margaret W. DuPont Master Clinical Teaching Award. Established in 2001 and made possible by a gift from the DuPonts, the award recognizes and preserves the essence and quality of the master clinical teacher, reflecting the Medical School’s top priority of quality clinical medical education.

Jose Garcia, M.D., professor of pediatrics and chief of pediatrics at LBJ General Hospital, received the Children At Risk Child Health Advocacy Award from the Children At Risk organization. The award is presented annually to an outstanding advocate for the health needs of children.

Rebecca Girardet, M.D., was named the first director of the Division of Child Protection Pediatrics in the Department of Pediatrics. An associate professor of pediatrics, Dr. Girardet is medical director of the Harris County Hospital District Forensic Nurse Team, a member of the honorary Ray Helfer Society, a fellow of the American Academy of Pediatrics, and a member of the Texas Pediatric Society Committee on Child Abuse and Neglect.

John Hancock, M.A., M.B., B.Chir., Ph.D., chair of the Department of Integrative Biology and Pharmacology and executive director of the IMM, was awarded a prestigious Doctor of Science (ScD) degree from the University of Cambridge. The ScD is the highest degree awarded by the university for distinguished research in science and is only conferred on scientists with a proven record of internationally recognized scholarship, including substantial and sustained contributions to scientific knowledge.

Nneka Ifejika, M.D., assistant professor of neurology and director of neurorehabilitation for Memorial Hermann-TMC, was selected for the inaugural class of the American Academy of Physical Medicine and Rehabilitation’s Academy Leadership Program. Dr. Ifejika was one of just 10 academy members selected from a national pool to participate in the two-year program, which is designed to identify and train early career physical medicine and rehabilitation physicians to assume future leadership positions.

Lillian Kao, M.D., associate professor of surgery, received an implementation science research award from the Association for Professionals in Infection Control and Epidemiology (APIC). The grant was presented through APIC’s Heroes Research Award program, for “Strategies for Preventing Healthcare Associated Infections – Putting Them into Context.”

Tien Ko, M.D., the Jack H. Mayfield, MD, Distinguished Professor; vice chair, Harris Health System in the Department of Surgery; and chief of surgery at LBJ General Hospital, was elected chair of the Medical Executive Board of Harris Health System. As the chair, he will represent the medical staff of Harris Health System at the monthly Medical Executive Board meetings and at the Harris Health Board of Managers meetings to discuss issues such as medical staff credentialing, quality improvement, and physician satisfaction.
Pedro Mancias, M.D., associate professor of pediatrics and neurology in the division of child and adolescent neurology and assistant dean of diversity and inclusion, was the winner of the John P. McGovern Outstanding Teaching Award as the exceptional clinical teacher.

Donald Molony, M.D., professor of internal medicine, was elected chair of the Faculty Advisory Council for The University of Texas System. The University of Texas System Faculty Advisory Council is a selected representative advisory group that works with, and on behalf of, faculty of The University of Texas System.

Ponnada Narayana, Ph.D., and Jonathan Ophir, Ph.D., professors in the Department of Diagnostic and Interventional Imaging, were among recipients of the 2013 Distinguished Investigator Award of the Academy of Radiology Research. Dr. Narayana is director of Magnetic Resonance Research at the Medical School. His major research interests include quantitative magnetic resonance of the central nervous system, development of advanced magnetic resonance techniques, and image processing. Dr. Ophir is director of the Ultrasonomics and Elastographies Laboratory. His current research is focused on ultrasonic tissue characterization and elastography, the imaging of the elastic properties of soft tissues using ultrasound.

Joanne Oakes, M.D., associate professor of emergency medicine, was named one of the top 25 women professors in Texas by OnlineschoolsTexas.com. She also was the recipient of the Leonard Tow Humanism in Medicine Award presented by the Arnold P. Gold Foundation, which annually recognizes faculty who are exemplary in their compassion and sensitivity in the delivery of care to patients and their families, who administer scientifically excellent clinical care, and who serve as role models to students.

Philip Orlander, M.D., professor and director of the Division of Endocrinology, Diabetes and Metabolism in the Department of Internal Medicine, received the UTHealth President’s 2013 Scholar Award for Teaching.

Luis Ostrosky-Zeichner, M.D., professor of internal medicine, infectious diseases, was named fellow of the Society of Healthcare Epidemiology of America. This distinction recognizes and honors those who have achieved professional excellence in healthcare epidemiology and infection prevention and control.

Susan Pacheco, M.D., associate professor of pediatrics, was among a group of individuals recently honored by The White House as “Champions of Change.” Dr. Pacheco was recognized for her work as a health representative for the Climate Science Rapid Response Team, a group of climate scientists who provide prompt information about the climate to the media and government in an effort to narrow the gap between what scientists know about climate change and what the public knows.

Pamela Promecene-Cook, M.D., associate professor and residency program director in the Department of Obstetrics, Gynecology and Reproductive Sciences, was named assistant dean for graduate medical education.

Ronald Rapini, M.D., Josey Professor in Dermatology and chair of the Department of Dermatology at both the Medical School and MD Anderson Cancer Center, received the 2012 Founders’ Award of the American Society of Dermatopathology. Chief of dermatology at LBJ General Hospital, he also received the 2013 Robert G. Freeman Mentoring and Leadership Award from the Texas Dermatological Society.
Julia Shelburne, M.D., assistant professor and vice chair for healthcare quality in the Department of Pediatrics, was named assistant dean for graduate medical education.

Keely Smith, M.D., assistant professor of pediatrics, was awarded the Children at Risk Child Health Advocacy Award. Dr. Smith, director of the Pediatric Residency Program, was recognized for promoting community-based pediatric child health and legislative advocacy among UTHHealth pediatric residents.

Margaret Uthman, M.D., professor and vice chair for education in the Department of Pathology and Laboratory Medicine, was named to the new position of associate dean for graduate medical education and as the ACGME designated institutional official for the Medical School.

The Medical School’s psychiatry residents team took home another Mind Games win with the 2013 trophy at the annual meeting of the American Psychiatric Association in San Francisco, besting finalists from Cornell and UCLA. The UTHealth team was comprised of Garima Arora, M.D.; Marsal Sanches, M.D.; and Ashley Toutounchi, M.D.

Kyle Woerner, M.D., a fourth-year orthopaedic surgery resident, was the winner of the Benjy F. Brooks, M.D. Outstanding Clinical Faculty Award. Established in 1991 by the Alumni Association, the Benjy Brooks award is presented by the Medical School alumni to recognize individuals “who complement and enhance the education program by serving as role models for students.” It is named in honor of Dr. Benjy Brooks, the first board-certified woman pediatric surgeon in the United States, who joined the Medical School’s faculty in 1973 and remained active in the life of the Medical School until her death in 1998.

Han Zhang, M.D., associate professor of neurobiology and anatomy, is the winner of the John H. Freeman Award for Faculty Teaching. Chosen by the senior class, this is the fourth time Dr. Zhang has received the award, which is given annually to recognize the Medical School’s outstanding basic science faculty member. Recipients may not win the award in consecutive years.

Six Medical School faculty members were among the prestigious winners of the University of Texas System Board of Regents faculty awards: Samer Fakhri, M.D., associate professor of otorhinolaryngology; Steven Norris, Ph.D., professor of pathology and laboratory medicine and holder of the Robert Greer Professorship of Biomedical Sciences; Philip Orlander, M.D., assistant dean for educational programs; Bela Patel, M.D., assistant dean of healthcare quality and assistant chief medical officer of Memorial Hermann-TMC; Gary Rosenfeld, Ph.D., assistant dean for educational programs; and Margaret Uthman, M.D., associate dean for educational programs.
The UTHealth Medical School is proud of our hospital affiliations, which serve as teaching venues for our students, residents, and fellows. Our primary teaching hospitals are Memorial Hermann-Texas Medical Center and LBJ General Hospital.

**UT Physicians**

UT Physicians is the medical group practice of the UTHealth Medical School.

Physicians, residents, fellows, and students provide exemplary clinical services at UT Physicians offices located throughout the Texas Medical Center and Houston, with a focus on patient safety and quality.

The fastest-growing academic clinical practice in the nation, UT Physicians includes more than 900 physicians certified in 80 medical specialties and subspecialties, providing care for the entire family.

**Children’s Memorial Hermann Hospital**

Children’s Memorial Hermann Hospital has been serving the community for over 20 years and is the primary teaching hospital for the pediatrics and obstetrics/gynecology programs at the UTHealth Medical School.

A recent facility expansion increased its capacity to 240 beds, making Children’s one of the country’s largest pediatric hospitals. Its Women’s Center operates an additional 68 beds. The facility offers colorful decor and special play areas for children. Education and support services for families are also available, as are services for international patients.

**UT MD Anderson Cancer Center**

The University of Texas MD Anderson Cancer Center, located in the Texas Medical Center, is widely regarded as one of the world’s foremost centers for cancer care, research, education, and prevention. Since its opening in 1944, MD Anderson has treated more than 900,000 patients with cancer and allied diseases in its inpatient and outpatient services.

The institution also houses a large clinical and basic science research program devoted to the investigation of the biology of cancer and includes active units in biochemistry, biological response modifiers, biophysics, molecular biology, pathology, pharmacology, cell biology, and cancer prevention.

MD Anderson Cancer Center offers a wide range of training programs involving more than 10,000 students annually in the sciences and health professions.
The UT Harris County Psychiatric Center (HCPC), which opened in 1986, is a 222-bed public acute care psychiatric hospital that delivers a comprehensive program of psychiatric and clinical social services to more than 6,000 inpatients and 14,000 outpatients annually. The center plays an important role as a teaching facility for medical and nursing schools across Texas and Louisiana.

Patients, including children, adolescents, and adults, suffer from mental illness, including bipolar disorder (manic depression), depression, schizophrenia, behavioral disorders, and adjustment disorders.

Operated by The University of Texas Health Science Center at Houston, the facility is jointly supported by the State of Texas and Harris County under the auspices of the Texas Department of State Health Services and the Mental Health and Mental Retardation Authority of Harris County, respectively. The Medical School’s Department of Psychiatry and Behavioral Sciences provides administrative leadership and medical services for the center.
There could not have been a better time to become part of UTHealth than 2013. This year we celebrated our 40th anniversary as Houston’s health university, years of expansion and achievement. Over just the past 10 years, the faculty has grown by nearly 500, our research expenditures have steadily increased by 9 percent per year, our physical plant has expanded by nearly 2.5 million square feet, and enrollment has grown by nearly 40 percent. Among our many achievements in research and education, we are leaders in translational science, curriculum innovation, and molecular medicine, and our university is receiving wider recognition than ever before.

Development has an important role to play in this expansion and advancement. Philanthropic funding is an incubator for innovation, often the first support for ideas at the cutting edge and for bold endeavors. Much of what we prize in our city – including the Texas Medical Center – would not exist without philanthropic vision.

I am happy to be here and excited about working with you to support UTHealth and – far more important – to fulfill its mission to improve human health and well-being.

Kevin J. Foyle, MBA, CFRE
Vice President, Development, UTHealth
What spells success in the field of development?

Social skills matter. So does an interest in other people – and commitment to a cause. Those abilities may mean that you are attracted to development.

But getting the job done, according to executive director of development at UTHealth Medical School James Hughes, takes management ability – business acumen, communication skills, the ability to coordinate the activities of highly talented professionals in a complex environment and bring the right people into alignment for the best outcome. Rather like what is required of the conductor of an orchestra.

Hughes should know. Those are the very skills he was honing as a student completing his bachelor’s degree in music performance from the University of Richmond, and later his master of music degree in conducting from Emory University.

After further graduate studies at the University of Oklahoma, Hughes’ management skills led him to the position of executive director of Canterbury Choral Society, Oklahoma’s premier symphonic chorus, and then to Houston, where he served as executive director of Bayou City Performing Arts.

“I don’t suppose anyone in development actually set out to be a professional fundraiser upon entering college. But, just as it happened with me in this one fateful move, the same is true for so many others. We tumble into it and discover a world perfectly suited for who we are,” he explains.

After a decade in Houston, a city whose non-profit sector has not only a strong cultural component but the 54 institutions of the Texas Medical Center, he moved from performing arts management and development to medicine and scientific research.

Before taking on the leadership of the Medical School’s development office in early 2013, Hughes worked in development at the University of Texas MD Anderson Cancer Center and The Methodist Hospital Research Institute.

At UTHealth, Hughes directs a growing team of development professionals seeking to advance the mission of the Medical School through philanthropic support.

“We’ve had early and promising success that suggests this institution’s future prospects for support are ready and willing to help. In just three fast-paced months, our team has met with literally dozens of our faculty, community leaders, and benefactors, and we are inspired and enthusiastic for the work that lies ahead,” he says.

Hughes is a frequent guest speaker on best practices in portfolio development, management, and stewardship.
Ronnie Schuster was 7 months old when he was diagnosed with a rare, disabling disease.

“When my son was diagnosed in 2003 with West Syndrome, I was told to take him home and enjoy the time I had left with him by many physicians,” recalls his mother, Ruth Brewer. “It was a devastating diagnosis and one that presented very little hope of recovery or quality of life.”

Ronnie endured rounds of testing, and Brewer was given no treatment plan for her son’s neurological disease, which is hallmarked by spasms and developmental regression.

“West Syndrome is also related to other disorders that ‘pop up’ in later months, such as cortical blindness, autism, and cerebral palsy, all of which my son has,” Brewer adds.

Despite trying different medical treatments, Ronnie still suffers from this orphan disease.

“My sweet boy deserves so much better than the options available to him,” Brewer says. “He continues to this day to fight like a tiger with a smile on his face no matter what.”

Inspired by her son’s courage and optimism, Brewer set out to create a place of hope for all patients like Ronnie. A $1 million endowment on behalf of the West Syndrome Foundation has established the UTHC-Health Center of Excellence for West Syndrome Research and the Geissler Distinguished Chair in West Syndrome Research at the University of Texas Health Science Center at Houston (UTHHealth).

“I know there are tens of thousands of Ronnies in this world. I’ve had the privilege of getting to know some of them and their families. This is what fuels our passion to do better for them each day,” Brewer says.

The center will focus on searching for the causes of, and developing new treatments for, West Syndrome and related pediatric epilepsy disorders, as well as in-

My colleagues in pediatric epilepsy and I are excited to be given the opportunity to establish a center devoted to clinical care and research for patients with infantile spasms.

- Dr. Ian Butler, director of the Division of Child and Adolescent Neurology
creasing awareness about the disease.

"My colleagues in pediatric epilepsy and I are excited to be given the opportunity to establish a center devoted to clinical care and research for patients with infantile spasms. In addition to exemplary clinical management, the center will have an important role in increasing our understanding of this condition," says Ian Butler, M.D., professor and director of the Division of Child and Adolescent Neurology in the Department of Pediatrics and the first Geissler Distinguished Chair in West Syndrome Research.

Dr. Butler, who diagnosed Ronnie, has been an important part of the Brewers’ journey.

"He was sincerely saddened by the diagnosis and allowed that to show," Brewer says. "Humanizing the process for us was so helpful, as other doctors involved in his care were not so gentle. There was no other place we could establish this chair — UTHealth with Dr. Butler was always our only and best choice."

Brewer says she wants other families experiencing West Syndrome to have a more positive outlook on the future of this disease.

“There has to be a place where our families living all over the world can come or call to find out their best options for their children, or even now grown adults,” Brewer says. “Bringing about this coordinated effort will undoubtedly bring about change, and change ignites hope, finally.”

Love and hope are the roots of this new center.

“It is my hope that I can make up for his suffering, and hopefully ameliorate the suffering of others, by starting this effort,” Brewer says. “Love for Ronnie, not just my love but the love of many, kindled this center, and I am hopeful that the effort leads to answers — what caused my son’s disorder, what’s the treatment, what’s the cure?

“I am confident UT and Dr. Butler will answer those questions, and I look forward to watching the center grow for all the Ronnies out there, little and big. Perhaps our families can now breathe a collective sigh of relief. There is hope. There is a lighthouse at UT just for us. Finally.”

Dr. Ian Butler, holder of the first Geissler Distinguished Chair in West Syndrome Research, cares for a patient.
UTHEALTH MEDICAL SCHOOL STUDENTS
ENTERING CLASS STATISTICS

2013 RESIDENTS AND FELLOWS

Number of ACGME residencies ...................................................... 26
Number of ACGME fellowships.................................................... 39
Number of Texas Medical Board Fellowships/non-ACGME ................. 48
Total residencies and fellowships by specialty .................................. 113
Total number of ACGME residents ................................................ 765
Total number of ACGME fellows ................................................... 150
Total number of Texas Medical Board/non-ACGME fellows ................. 47
Total number of Oral and Maxillofacial Surgery Dental Residents .......... 24
Total residents and fellows enrolled ............................................. 986

WHERE UTHEALTH MEDICAL SCHOOL ALUMNI LIVE*

Top Ten States for Alumni

Texas ........................................... 7,740
California .................................... 759
Florida ........................................ 449
North Carolina ................................ 231
Colorado .................................... 224
Louisiana .................................... 212
New York ...................................... 209
Georgia ...................................... 194
Arizona ....................................... 184
Tennessee .................................... 176

* known addresses include resident alumni
**PROPOSALS, CONTRACTS AND GRANT AWARDS**

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<td>960</td>
<td>658</td>
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<tr>
<td>FY 12</td>
<td>882</td>
<td>620</td>
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<tr>
<td>FY 13</td>
<td>877</td>
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**TOTAL REVENUES VS. EXPENSES OF THE UT HEALTH MEDICAL SCHOOL’S PRACTICE PLAN**

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RESEARCH EXPENDITURES

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INTELLECTUAL PROPERTY ACTIVITY

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<td>New US Patent Application Files</td>
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<td>Licenses/Options Executed</td>
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<td>Licenses/Options Generating Income</td>
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<td>US Patents Issued</td>
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<td>Startup Companies Formed</td>
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Royalty and License Fee Income*       | $2,929,672 | $3,020,063 | $2,850,664

*Estimates based on percentage of agreements generating income and royalty and licensing fee income associated with the medical school
Fund-raising commitments to the UTHealth Medical School

FY 11 FY 12 FY 13

Dollars in millions

$16,619,815 $15,518,578 $14,630,455

Donations to the UTHealth Medical School

FY 11 FY 12 FY 13

Number of Gifts

1,375 1,382 1,349
TOTAL OUTPATIENT VISITS

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GROSS PATIENT CHARGES OF THE UTHEALTH MEDICAL SCHOOL'S PRACTICE PLAN

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<th>Year</th>
<th>Dollars in millions</th>
<th>FY 11</th>
<th>FY 12</th>
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<td></td>
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<td>$642,681,353</td>
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Uncompensated Care includes the unreimbursed costs for the uninsured (those with no source of third party insurance) and the underinsured (those with insurance who after contractual adjustment and third party payments have a responsibility to pay but are unable to pay). Uncompensated care also includes the unreimbursed costs from governmental sponsored health programs.

The institution identifies the gross charges for uncompensated care by identifying the payer categories where the cost of care exceeds the appropriate, available funding.

The institution converts gross charges for uncompensated care to cost by relating them to the Medicare fee schedule on an aggregate weighted average basis.

The institution recognizes payments from patients, government sponsored programs (Medicare, Medicaid, and local government programs) and other appropriate lump sums, including any amounts recovered from Upper Payment Limit, as funding available to offset costs. The appropriate funding is applied to the cost of care for each payer category and uncompensated care is identified where the cost of care exceeds the available funding.

Dr. Joanne Oakes, emergency medicine physician, cares for patient Blanca Torres at LBJ General Hospital Emergency Center. LBJ General Hospital is one of two primary teaching hospitals for the UTHealth Medical School.
Giuseppe N. Colasurdo, M.D.
Dean

John F. Hancock, M.A., M.B., B.Chir., Ph.D., Sc.D.
Vice Dean for Basic Research

Jon E. Tyson, M.D., M.P.H.
Vice Dean for Clinical Research

Patricia M. Butler, M.D.
Senior Associate Dean for Educational Programs

John H. Byrne, Ph.D.
Associate Dean for Research Affairs

Charles M. Chassay, M.D.
Associate Dean for Alumni Relations and Assistant Dean for Admissions and Student Affairs

Craig Cordola, M.B.A., M.H.A.
Associate Dean for Hospital Affairs

Carmel B. Dyer, M.D.
Associate Dean for Harris County Programs

Wallace A. Gleason, M.D.
Associate Dean for Admissions & Student Affairs

David G. Gorenstein, Ph.D.
Associate Dean for Research Affairs

Margaret C. McNeese, M.D.
Associate Dean for Admissions & Student Affairs

Nancy O. McNiel, Ph.D.
Associate Dean for Administrative Affairs

Julie T. Page, C.P.A.
Associate Dean for Clinical Business Affairs

Angela Smith, C.P.A.
Associate Dean for Finance

Henry W. Strobel, Ph.D.
Associate Dean for Faculty Affairs & Alumni Relations

Eric Thomas, M.D., M.P.H.
Associate Dean for Healthcare Quality

Margaret O. Uthman, M.D.
Associate Dean for Graduate Medical Education

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Dr. James H. “Red” Duke, Jr., professor of surgery and John B. Holmes Professor in the Clinical Sciences, gives his traditional signal during the 2013 UTHHealth Medical School commencement ceremony May 31 at the George R. Brown Convention Center.