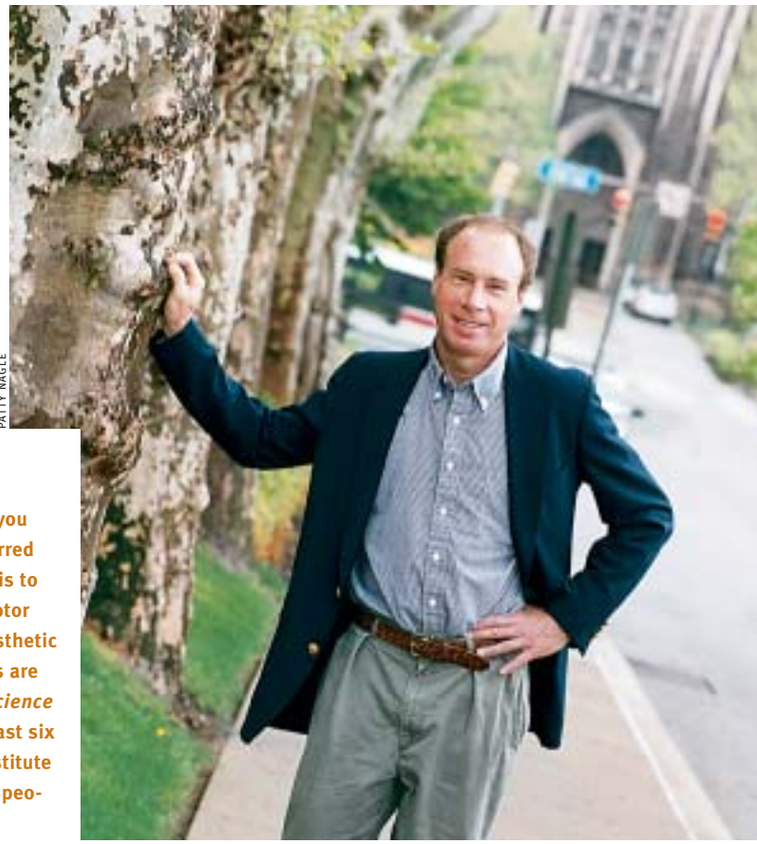


*Devoted to noteworthy happenings at the medical school . . . To stay abreast of school news day by day, see http://www.health.pitt.edu*

# Moving Easier

**Just as people are right- or left-handed, some neurons have a "preferred direction." If you reach your arm straight in front of you, for instance, motor cortex neurons whose preferred direction is straight ahead will be more active than neurons whose preferred direction is to the right or left. Using electrodes to track the activity of hundreds of neurons in the motor cortex, Andrew Schwartz found that when lab animals use their brains to control a prosthetic limb, their neurons' preferred directions actually change. After the change, the animals are able to control the artificial limb much more smoothly. His findings were reported in *Science* on June 7. Schwartz arrived at Pitt this month as a professor of neurobiology. For the past six years, he has held appointments at Arizona State University and the Neurosciences Institute in California. His remarkable findings may one day lead to tools that enable paralyzed people to direct robotic arms through electrodes implanted in their heads. —*DH***



PATTY NAGLE

Schwartz

## FOOTNOTE

**The creators of Scope and Scalpel 2002 offer this definition in their program glossary–**

**Carpal tunnel: The only tunnel in Pittsburgh that doesn't cause a traffic jam.**

## HEADS UP

**The American Society for Clinical Investigation (ASCI) has admitted its first otolaryngologist—Jennifer Grandis, MD '87, associate professor of otolaryngology and pharmacology. Grandis is Pitt's latest inductee into the prestigious ASCI, whose members must be admitted before the age of 45. Mark Zeidel, chair of the Department of Medicine, says that Grandis is one of only a handful of people in the country studying the basic science underlying head and neck cancer. "She has really gone into mechanism: Why do cells grow aberrantly?" says Zeidel. "She's also been actively involved in clinical trials to enhance the therapies we use." Grandis says her multiple roles—as clinician, clinical investigator, basic scientist, and teacher—are not that taxing for her. Her clinical practice motivates her to find better ways to help her patients. Three grants from the National Institutes of Health support her research. "I just have a passion," she says. "I have a wonderful life." —*DH***



Grandis

# Faculty Snapshots

In 2000, David Satcher, then the surgeon general, set health goals for US racial and ethnic minorities that were the same as those for US whites—*for the first time in his office's history.* Previously, surgeons general had resigned themselves to set lower goals for the health of those minorities. Recent reports compiled by Pitt researchers attest to the need to end racial health disparities. Black men in Allegheny County die an average of 5.7 years younger than white men; among women, blacks die 3 years younger than whites. Diabetes death rates for blacks in Allegheny County are twice those of whites. Blacks are 1.5 times as likely to die from unintentional injury as whites. **Ralph Bangs**, research associate at the Center for Social and Urban Research, compiled the reports, called the *Black Papers,* with the help of **Ken Thompson**, associate professor of psychiatry.

"The *Black Papers* are a call to action," says Thompson. "I'd like to see Pitt be known for an extraordinarily rich system of providing health care to people in communities where health is most threatened." The Neighborhood Physicians and Practitioners Forum, created by Thompson, is one way the physician seeks to address issues of local health inequalities.

FOR MORE INFORMATION ON THOMPSON'S NEIGHBORHOOD FORUM: thompsonks@msx.upmc.edu

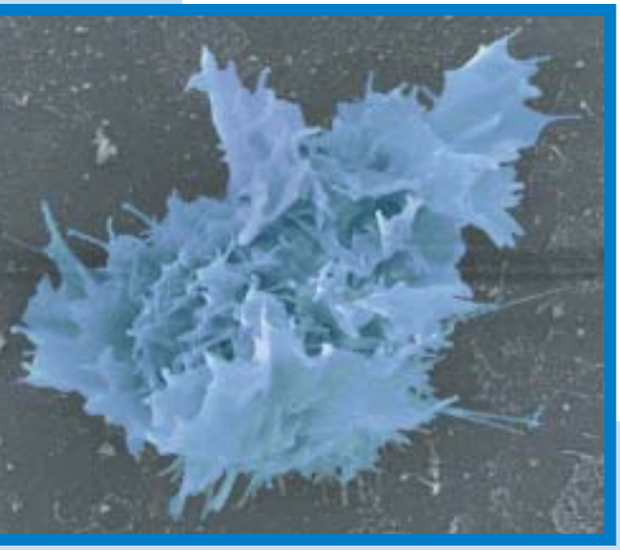


Scantlebury



Yeager

Transplanted kidneys are inevitably destroyed. While the body may tolerate the organ for a few years or for nearly two decades, eventually the immune system will turn the organ into scar tissue, a slow process called chronic rejection. **Velma Scantlebury**, associate professor of surgery, and **Andrew Yeager**, professor of medicine and pediatrics, recently tested a new procedure that may lengthen the functional life of transplanted kidneys. Yeager used a granulocyte colony-stimulating factor to stimulate production of stem cells in the bone marrow of a person donating a kidney to a sibling. (In the procedure, the marrow produces so many stem cells, they spill out into the blood. The stem cells are then removed from the blood and frozen.) Scantlebury transplanted the kidney; three days later, Yeager's team infused the stem cells into the recipient. The doctors hope that the stem cells will foster organ acceptance so the patient won't need to be as reliant on immunosuppressive drugs. The patient is doing well, but it is too early to assess the effects of the stem cell transplantation.



Langerhans cells

In a recent study published in *Nature Immunology,* **Louis Falo**, professor and chair of the Department of Dermatology, identified the precursors of epidermal Langerhans cells (LCs). LCs are skin cells that help to stimulate and control the body's immune response. Scientists hope that by manipulating LCs, they may be able to intensify, mute, or turn off the immune system. Falo plans to use LCs in designing vaccines against melanoma. *—DH*



D'Ambrosia (left) and Billiar

## KNOWING YOURSELF

**The children drifted toward the American air base in Thailand during the Vietnam War, tattered, starving, homeless. Robert D'Ambrosia, a flight surgeon, was compelled to help build an orphanage.**

**"Humanitarianism lets you know what kind of professional you are," says D'Ambrosia (MD '64, Res '70, Fel '70), who'll become chair of orthopaedic surgery at the University of Colorado in September after running the department at Louisiana State University for 26 years. "It takes you away from thinking about the dollar."**

**D'Ambrosia shared that message with the Class of 2002 in May while accepting the Hench Distinguished Alumnus Award, an honor bestowed by the Medical Alumni Association. He let his audience know that he learned much about serving others from his mentor, Albert Ferguson, the former chair of orthopaedic surgery at Pitt. *–DRE***

## THE RIGHT QUESTIONS

**Rarely does Timothy Billiar (Fel '90, Chief Res '92) break stride. However, in accepting the 2002 McEllroy Award, given by the Medical Alumni Association to recognize outstanding physicians who trained at Pitt, Billiar stoically said that former residents of Crete, the humble Nebraska town of his youth, were known as "ex-Cretans."**

**More commonly, Billiar, chair of surgery at Pitt since 1999, is known as a reserved scholar immersed in his work. Throughout his career, he's been a key player in understanding nitric oxide—a molecule essential to the healing process, among other benefits.**

**A good researcher understands the difference between knowing the answers and asking the right questions, he says. "As students, we are all programmed to do the former, but to become a successful researcher, you must be able to do the latter." *–DRE***

TOP RIGHT: JEN URICH. BOTTOM LEFT: COURTESY WATKINS



# Match!

## By Jessica Mesman

Deans Steven Kanter, Joan Harvey, and Paula Davis stand before the Class of 2002 with a stack of white envelopes.

For the past few years, an average of 83 percent of Pitt medical students have been assigned residencies with one of their top three institutions of choice. Today, Match Day, graduating students find out where they will end up. Each time the deans present a new envelope, there's a collective holding of breath.

Those whose names are called might take the steps two and three at a time, tear open their envelopes right away, and yell or dance or kiss the papers they find inside. But Peter Le clutches his envelope until he's back in his seat, where he unfolds his letter deliberately.

Cheers and congratulations ring through the auditorium: *Cornell! That is huge! I'm so psyched for you!—DC, baby!* Some yell into cell phones: *Mom! I got my first choice!* But Le, goose bumps on his forearms, is quiet. He hugs a friend in the neighboring seat.

"I'm going home," he says, and he smiles. Home means Orange County, University of California, Irvine Internal Medicine. And it means family and a large Vietnamese community. He rests his head on his knees and rocks back and forth in his seat.

Behind him, a blond woman jumps into a friend's hug and wraps her legs around him. "It's like getting into college all over again!" she yells. "It's awesome."

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## HEALTHY ENVIRONS

**Last year, Children's Hospital of Pittsburgh was deemed fourth best pediatric hospital in the nation, according to *US News & World Report*. A new building program will help keep Children's ahead of the pack. David Perlmutter, chair of pediatrics for the School of Medicine, loves to tell potential residents about the great future he envisions as the hospital plans a sorely needed new facility, making room to expand critical care, cardiac care, and other programs. Promise of a new clinical home helps Perlmutter woo top doctors to join the department, too, like Raphael Hirsch from Cincinnati Children's Hospital Medical Center ("the best person in the country for academic pediatric rheumatology," Perlmutter notes). Children's is also planning a new ambulatory care center. *—EL***



## Olympian Rewards

**The skis, poles, and racing gates weighed on the Icelandic men's Olympic ski team as they labored uphill across the snowy Utah mountains. Ian Greenwald and Eric Jensen, University of Pittsburgh residents in emergency medicine, felt sorry for them and helped. As a thank-you, the women's Icelandic team gave the two kisses on the cheek. And the men's team gave them Iceland pins. (Country pins are coveted items at the Olympics.)**

**It wasn't all pins and kisses for Greenwald and Jensen though. The residents were there to help in medical emergencies and disaster management at the 2002 winter games.**

**Other Pitt doctors made Olympian efforts, too: Chip Burke, team physician for the Penguins, was the doctor for the US men's hockey team. And Savio L-Y. Woo heads the International Olympic Committee's Olympic Academy on Sport Sciences. *—MH***



KEITH HOGAN

The president came to Pitt to announce his proposal to defend the nation against biological terrorism.

# Presidential Witness

**With the events of September 11 very much a point of discussion, in February President George W. Bush made the first visit by a sitting president to the University of Pittsburgh. He came to witness the Real-time Outbreak and Disease Surveillance system (RODS). Developed by School of Medicine researchers, RODS monitors data from 1,200 daily patient visits to western Pennsylvania hospitals, looking for symptoms of flu, respiratory illnesses, diarrhea, and skin rashes. A sudden increase in any of these symptoms might indicate a bioterrorist attack. (A few weeks after Bush's visit, RODS covered Salt Lake City during the winter games.) Bush called the system the modern "DEW line," referring to the Distant Early Warning radar system employed during the Cold War to guard against Soviet attack. "I've come to realize," he said, "that while Pittsburgh used to be called Steel Town, you need to call it Knowledge Town." *—DRE***

## Appointments

Husband and wife, epidemiologist and pathologist, discoverers of KSHV, the virus that causes Kaposi's sarcoma—**Patrick Moore** and **Yuan Chang** arrived at Pitt this month from Columbia University. Moore is program leader for the molecular virology program at the University of Pittsburgh Cancer Institute and professor of molecular genetics and biochemistry; Chang is professor of pathology. The researchers' first paper on Kaposi's sarcoma, the most common cancer in people with AIDS, was published in *Science* in 1994. The scientists went on to show that KSHV causes not only Kaposi's sarcoma, but also primary effusion lymphoma and multicentric Castleman's disease (a rare tumor-inducing disease of the lymph node tissue). The MD researchers will jointly manage a Pitt lab at the Hillman Cancer Center. They currently study specific KSHV genes that are expressed in tumors and try to determine how the proteins encoded by these genes interact with the cell. "If we can find out more about how KSHV causes cancer, we may be able to apply this knowledge to other cancers, even cancers that aren't caused by a virus," says Moore.

**Steven DeKosky**, a professor of psychiatry and neurology at Pitt since 1990, has been appointed chair of the Department of Neurology. DeKosky holds the largest single grant ever made by the National Institutes of Health's National Center for Complementary and Alternative Medicine. The grant supports a multicenter investigation into whether ginkgo biloba prevents the onset of dementia in older people. DeKosky also is known for clinical and basic science research on Alzheimer's disease. *—DH*



DeKosky



## THE MIDDLE PATH

**Steven Kanter and Jon Rittenberger have a dream. Really, it's a twinkle in the eye: They would love for all US middle school students to learn CPR, including how to use Automated External Defibrillators, and also be able to make informed decisions about their health. Well, they're one middle school closer. This spring, Marshall Middle School students from Pittsburgh's North Hills came to Pitt for a day. Kanter, senior associate dean (above, right), and Rittenberger (MD '02) enlisted other fourth-year med students and faculty to run sessions like CPR, Where's Waldo in Radiology, and the Host/Defense Game for the kids. "They got to see how doctors use their senses (sight, hearing, touch) in coordination with high-powered technology to help patients," says Rittenberger, who helped with the patient simulator station, Sim Man. *—EL***



PATTY NAGLE

# TERRIFYING AND THRILLING ADVENTURES IN SONG

BY DOTTIE HORN



Annie Lee, Paul Bryson, and George LaVerde

One Sunday last January, Annie Lee was worried. The following weekend, she would be performing with the Mendelssohn Choir of Pittsburgh. But, before the concerts were rehearsals on Sunday, Tuesday, Wednesday, and Thursday—for a few hours each night. She had a reproductive and developmental bio exam on Saturday. The weekend following the concerts, she would be going to a conference, giving a talk on her otolaryngology research. How was she going to study for her exam, go to class, prepare her talk, and sing six times in one week?

Then she went to rehearsal, and her mood changed. "While you're singing, you forget about med school. It's energizing," she says. As she drove home, she put in a Brahms tape, the piece they would be performing.

"I was humming. I was singing along," she says. "I was just totally immersed in the music."

For third-year University of Pittsburgh medical students Lee and Paul Bryson and MD/PhD student George LaVerde—all members of the Mendelssohn Choir—it's hard to imagine life without singing. They've gained so many friends and opportunities through music: Bryson traveled to Russia, Estonia, and Finland last summer as part of a choral group. And singing is such a refreshing emotional release, a balance to medicine. If Lee doesn't sing, she gets cranky.

Weekly three-hour rehearsals are a part of their lives; and concert weeks are much more intense. The demanding practices are led by Grammy Award-winning music director Robert Page, whom the students describe as good-natured, unforgettable, creative, comical—and occasionally terrifying.

"He requires an enormous amount of focus and concentration," says LaVerde. "If you can't muster the energy that night, he'll know it."

"And he'll let you know that he knows it," adds Lee.

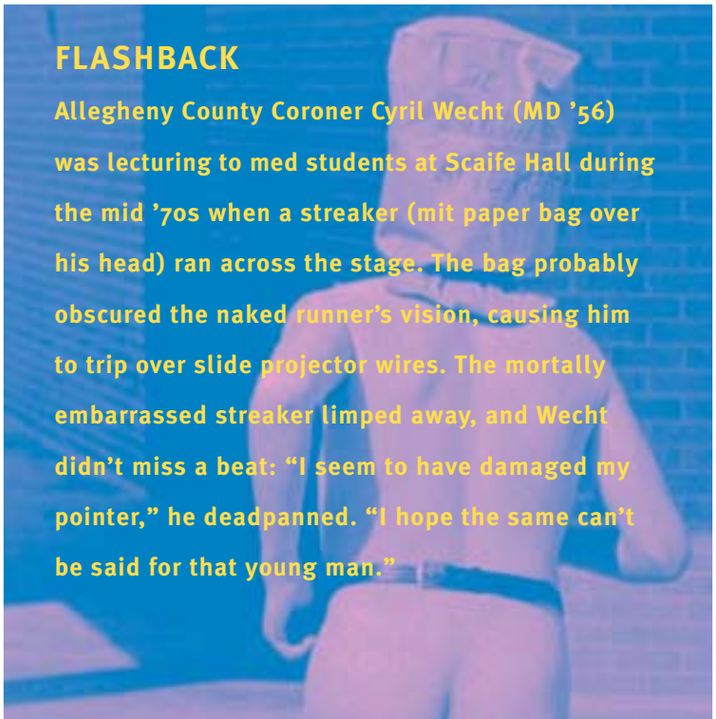
Page challenges them without singling out individual choir members. At a typical rehearsal, if the choir doesn't sound energetic enough, Page might say, *Don't sit there like a puddle of flesh.* If singers are looking down at their music rather than watching him conduct, *Why are you looking at your crotches? I'm not down there.* He often has the choir repeat phrases in the music until he's satisfied, and if the singers are not producing the desired change, he quips, *Don't do the same thing and expect a different result.*

The demands of rehearsals build up to the thrills of performance—the adrenaline of stepping onstage in a packed Heinz Hall, the delicate passage in a requiem that a performer can't get through without a teary eye. "Sometimes, there's just a very soft, gentle moment in a piece where every single singer gels together into one sound, and you're lifted up," says LaVerde.

And there are the reminders, with every concert, that each performance is fleeting:

As the choir breaks off its final note, there is silence, but the show is not over. The conductor has not yet put down his baton. He has not given the audience leave to respond. Every performer is focused on his hands. The choir members may feel tired, may feel a little relief that it's over, and they got through. Their conductor glances at them with a nod or smile. That silent instant is tense, magical, frozen in time.

The baton lowers. The audience cheers.



**FLASHBACK**

**Allegheny County Coroner Cyril Wecht (MD '56) was lecturing to med students at Scaife Hall during the mid '70s when a streaker (mit paper bag over his head) ran across the stage. The bag probably obscured the naked runner's vision, causing him to trip over slide projector wires. The mortally embarrassed streaker limped away, and Wecht didn't miss a beat: "I seem to have damaged my pointer," he deadpanned. "I hope the same can't be said for that young man."**