ILLINOIS INSTITUTE OF TECHNOLOGY

IT's Global Reach Up Close, Personal, and Worldwide

STYX'S JAMES "J. Y." YOUNG From Rockets to Rockin' **PARTH KAPADIA** Blazing the Flower Trail **DANIEL MAGASANIK** Winds of Change

Fall 2013

Effer from the President

"I live my life in widening circles that reach out across the world." —Rainer Maria Rilke



I especially look forward to two times of the year on the academic calendar. One is Commencement. I like to remind people that graduation is associated with "commencement" for a good reason. It is the beginning of "life after IIT" and, if we have done our jobs well, our students start traveling down a road carrying with them the tools they need to be global citizens, contributors to society, and innovative thinkers.

The second time is the beginning of fall semester. I get particular pleasure in welcoming back our returning students and getting the chance to know those who are arriving on campus for the first time. This fall, enrollment and retention reached new heights. Retention, defined as the percentage of first-year students who return for their second year, now stands at 93 percent—the fourth year in a row we have exceeded 90 percent. Our first-year, full-time undergraduate enrollment is the highest since 1981, and our total enrollment (graduate plus undergraduate) is the highest since 1968.

There is a renewed energy and spirit on campus, in part from having more students, but also because of the young men and women who have come to IIT from 94 countries. They bring with them new perspectives—and their presence adds to the cultural richness for which our university is known.

At this year's international alumni gathering in Seoul [page 8], I was pleased to report that students from Asia, Africa, Europe, Central America, South America, as well as the United States and Canada, continue to follow in their footsteps—coming to Chicago and IIT for a world-class education. It was a trip that reaffirmed for me that the accomplishments of our international alumni have had a significant impact on our ability to attract talented students from around the world.

Members of the IIT community are also embarking on projects that extend far beyond our nation's borders, improving the quality of life in major cities and re-shaping small villages in ways that are both beautiful and profound. Our students, faculty, and alumni are working and studying in countries around the world, taking with them the entrepreneurial drive and curiosity for which this university has always been known, while bringing home new appreciation for different perspectives and points of view.

When I look out from the stage at Commencement in the spring and walk across campus each fall, I remind myself not to take our diversity for granted. It is so much a part of who we are as a university that it is sometimes easy to forget that its impact on all of us is significant. The diversity of the IIT community helps ensure that we will continue to look at our world through a global lens, that we will remember to embrace cultural differences, and that we have a responsibility as citizens to continue to make our world a better and safer place for the generations that follow.

John h. anderson

John L. Anderson President

ii magazine

VICE PRESIDENT FOR MARKETING AND COMMUNICATIONS

EDITOR

CONTRIBUTORS

David Chong Richard Harth Jeanne Hartig Colleen Humer Chelsea Kalberloh Jackson

ART DIRECTOR/DESIGN

IIT MAGAZINE IS PUBLISHED THREE TIMES A YEAR BY THE IIT OFFICE OF MARKETING AND COMMUNICATIONS.

IIT Magazine is a 2013 recipient of the Publicity Club of Chicago Silver Trumpet Award for Excellence in Newspapers or Magazines, and a 2012 CASE V Silver Medal for Best Alumni Magazine.

SEND LETTERS TO

IIT Magazine Office of Marketing and Communications 10 West 35th Street, Suite 4D7-1

OR EMAIL iitmagazine@iit.edu

SEND ALUMNI NEWS TO alumni@iit.edu

Founded in 1890, Illinois Institute of Technology is a private, Ph.D.-granting research university that awards degrees in engineering, the sciences, architecture, law, design, psychology, humanities, applied science, and business.

IIT MISSION STATEMENT

To provide distinctive and relevant education in an environment of scientific, technological, and professional knowledge creation

IT Armour College of Engineering IT Chicago-Kent College of Law IIT College of Architecture IIT College of Science IIT Institute of Design IIT Lewis College of Human Sciences IIT School of Applied Technology IIT Stuart School of Business

ADA STATEMENT

ADA STATEMENT Illinois Institute of Technology provides qualified individuals with disabilities reasonable accommodations to participate in university activities, programs, and services. Such individuals with disabilities requiring an accommodation should call the activity, program, or service director. For further information about IIT's resources, contact the IIT Center for Disability Resources at disabilities@iit.edu.



Certified Chain of Custody

 14

8 **ON THE COVER**

IIT's Global Reach

From the Americas to Australia, IIT alumni, students, and faculty continue to further IIT's vision to be "internationally recognized in distinctive areas of education and research."

Cover: Library/study space in Twifo Hemang, Ghana PHOTOS: FRANK FLURY

EUROPE: A RISE AND SHINE SUMMER EXPERIENCE FOR STUDENTS

10

- 14 **ASIA: XIANG-YANG LI AND ERDAL ORUKLU** Tuning Into Cognitive Radio
- 18 AUSTRALIA: DANIEL MAGASANIK (Ph.D. GT '63) Clean Energy Down Under
- 22 NORTH AMERICA: JAMES "J. Y." YOUNG (MAE '70) The Universal Language of Music
- 26 SOUTH AMERICA: PARTH KAPADIA (CE '13) The Future of Flowers
- 30 **AFRICA: FRANK FLURY** Design/Build Team Travels to Ghana

Departments

- 2 NEWS BRIEFS
- **36** ALUMNI NEWS
- 44 REWIND

IIT MAGAZINE ONLINE-ONLY CONTENT!

Read extended coverage of stories featured in the print edition as well as special onlineonly content at www.iit.edu/magazine





TRANSFORMING MAIN CAMPUS

How do you advance the legacy of a university whose graduates are hardwired to ask "what if?" and to answer "why not?" By making an investment in the next generation of innovative thinkers.

Two key priorities in *Fueling Innovation: The Campaign for IIT* are providing the impetus for this investment in the university's distinctive education that produces graduates who are entrepreneurs, innovators, and leaders:

TO CREATE A TRANSFORMATIONAL INNOVATION CENTER

The first new academic building on Main Campus in more than 40 years, the Innovation Center at Illinois Tech will be a place for students, faculty, researchers, and industry partners to become inspired, collaborate with like-minded people, and develop groundbreaking

fuelinginnovation

IIT's six-year fundraising campaign, launched on June 1, 2010, and currently in its public phase, reached a giving total of \$148,160,883 as of September 30, 2013.

TO REVITALIZE CORE CAMPUS BUILDINGS

Two projects define the priority of revitalizing core campus buildings: the Life Sciences building, to be named the Robert A. Pritzker Research Center, and Engineering 1 building, which will be named the John T. Rettaliata Engineering Center. Each building will undergo significant transformations to support teaching environments that bring together students, faculty, and twenty-first century technologies in dynamic classrooms, laboratories, and collaborative spaces.

Architect Dirk Lohan is finalizing renderings and the Master Plan for Engineering 1 building, with construction scheduled to start this winter. Plans and renderings for the Life Sciences building are near completion and construction is slated to start in spring 2014.

For more than a century, IIT graduates have transformed this community, this city, and the world in which we live. Visit **fuelinginnovation.iit.edu** to learn more about plans for the Innovation Center and for updates on the Engineering 1 and Life Sciences buildings.

CAMPAIGN PRIORITIES AND PROGRESS AS OF SEPTEMBER 30, 2013

CREATE A TRANSFORMATIONAL INNOVATION CENTER Goal: \$40 million Progress: \$5,535,503

REVITALIZE CORE CAMPUS BUILDINGS* Goal: \$25 million Progress: \$19,542,079

PURSUE ANSWERS TO SOCIETY'S URGENT CHALLENGES Goal: \$85 million Progress: \$59,960,076

OPEN THE DOOR TO A TWENTY-FIRST CENTURY EDUCATION Goal: \$40 million Progress: \$25,102,329

BUILD IIT'S DISTINCTIVE ACADEMIC PROGRAMS AND ENHANCE THE CAMPUS EXPERIENCE Goal: \$30 million Progress: \$20,578,816

GROW RESOURCES FOR STRATEGIC AND OPERATIONAL CAPACITY Goal: \$30 million Progress: \$17,345,136

* Includes capital and expendable gifts for multiple renovation projects, equipment, supplies, and space.

This reflects progress through September 30, 2013; additional giving includes \$96,944, with funding initiative to be determined.

Write Bac

IIT Magazine welcomes all signed letters to the editor and edits letters for content and clarity. Please send correspondence to:

> *IIT Magazine* c/o Letters 10 West 35th Street, Suite 4D7-1, Chicago, IL 60616 **Email:** iitmagazine@iit.edu

INFORMATIVE ARTICLE

inventions. It will

university's core strength: a collaborative,

multidisciplinary,

applications-driven

environment. This

architecturally significant

building will be home to IIT

Institute of Design, Knapp

Self Leadership Academy,

and the Interprofessional

Projects (IPRO) Program.

Entrepreneurship Academy,

be a symbol of the

I enjoy receiving *IIT Magazine* and especially enjoy reading the Class Notes section. This time, my wife and I enjoyed reading the article about S. Y. Chen.

I watch various network TV news shows and read both the local and national newspapers. I had never heard about any radiation plume, so my wife and I enjoyed the summer 2013 issue even more. Thank you for the article! *Ronald A. Dickman (BE '67)*

Bringing Attention to the Supreme Court by David CHONG

hen the United States Supreme Court heard high-profile cases this past term—including the Defense of Marriage Act and the Voting Rights Act—Americans could hear every word exchanged between justices and lawyers during oral arguments thanks to audio recordings released by the Supreme Court. The exchanges gave both legal pundits and the public some initial clues as to how the justices viewed these big issues, with expert analysis of the recordings spurring predictions about how the high court might rule.

IIT Chicago-Kent College of Law Professor Jerry Goldman says Americans get a better sense of the Supreme Court and its decisions when hearing the Court in action, rather than reading just a transcript or news story.

"The more access the public has to our highest courts, the stronger our democracy can work," Goldman says.

This belief has driven Goldman to spend decades assembling the country's largest collection of audio of the U.S. Supreme Court. Dubbed the Oyez® Project, the archive is currently housed at Chicago-Kent and contains nearly 14,000 hours of recordings from more than 8,100 cases. *Oyez* means "listen!" in French, and the Marshal of the U.S. Supreme Court recites the words when the justices arrive in the courtroom.

Although Supreme Court recordings have been recorded since the 1950s, they were not initially meant for the public, and until the 1990s, most Americans never heard them. The Oyez Project was created to make the work of the Supreme Court accessible to everyone, be it through text, audio, or other media.

Not only can visitors download recordings from any Supreme Court case for free, they also have access to supporting documents and information that explain the context and history.

"In my judgment, there is more public awareness of the work of the Court, and my mission is to make sure the public understands it—not from a technical or legal perspective, but from a simple, plain-English perspective," Goldman says. "What is this case about? What are the facts? What happened to the individual who brought this case after the Court decided?"

Goldman brought the Oyez Project to Chicago-Kent in 2011 from Northwestern University, where he started the project 20 years ago when he saw the potential for technology to reshape access to information and data.

Chicago-Kent law students have the opportunity to work as paid research assistants on the Oyez Project and do everything from identifying speakers in recordings to collecting documents that might enhance the public's understanding of a case. Goldman also teaches a seminar on the Supreme Court and has taken students to Washington, D.C., to hear oral arguments at the Supreme Court and to tour the facilities. Past participants have met Associate Justice Sonia Sotomayor and on another occasion, Chief Justice John G. Roberts Jr. Goldman says of those meetings, "The students were thrilled because they had never been to the Court and had never been treated like [Supreme Court] insiders before."



With the U.S. Supreme Court archive now complete and up to date, the Oyez Project has begun to expand into other ventures. Goldman's joint collaboration with fellow IIT Chicago-Kent College of Law Professor Carolyn Shapiro yielded the ISCOTUS*now* smart phone app, which provides free access to recordings, documents, and transcriptions for cases on the current U.S. Supreme Court docket.

Thanks to a grant from the James L. Knight Foundation, the Oyez Project will also soon include multimedia archives for the state Supreme Courts of California, Florida, Illinois, New York, and Texas. Like the U.S. Supreme Court project, the state Supreme Court archives will offer audio and/or video from oral arguments, case supporting documents, and background information on the justices. Goldman says his ultimate goal is to create digital archives for the public for all state Supreme Courts and federal appeals courts.

"There are really important questions that come before the state high courts and the public needs to have an easy way to grasp that. We're going to provide that easy way," says Goldman.

He says decisions from the state Supreme Courts generally have a greater impact on people's lives than the U.S. Supreme Court. "The [U.S.] Supreme Court gets lots of attention, but who's covering the Illinois Supreme Court or the New York Court of Appeals? Not too many press people today."

Goldman, 68, wants to ensure the long-term viability of the Oyez Project when he eventually steps away from it and retires. He describes the Oyez Project as a public service and hopes to keep it available for free for years to come.

He says, "If we can do a good job at a good value proposition, and we can find a way to do this at very low cost with real benefit to the public and the courts, I think we can continue this for a long time."

MORE 🙆 NLINE

The Oyez® Project at IIT Chicago-Kent College of Law: www.oyez.org Supreme Court of the United States: www.supremecourt.gov

 Dr. and Mrs. Jorge O. Galante - The Glore Family F Mrc and Mrs. William Goodyear. Jr. - The Grainger Four Devid and Juli Grainger - Lynne Cooper Harvey Foun The Lilliam K. Hasterlik Family Memorial Fund

and Wyllem Hadengis - Mr. and Mr. Robert L. y d for Harb - Judyging Marvin Herb - Wendy and Th fool Works Found Thon - Drs -Olga and Anthony and Mrs. Richard M. Shire - Mr. and Mrs. William

Part Institution Constraints Mrs. Ion A. Marson R. Schemel Toronton, Providence - Mr. and Mrs. Institutions providence - Mr. and Mrs. Institutions

PHOTO: MICHAEL GOSS

and) also has a sec

Growing Scientists

y MARCIA FAYE

hile Robert Dawe (BME '06, Ph.D. '11) was an IIT student, he felt that his research on Alzheimer's disease could have a potential impact one day. The most common cause of dementia among older individuals, the irreversible, progressive illness may affect as many as 5.1 million Americans, according to the National Institute on Aging. But Dawe says the significance of his work became more tangible while he was an Achievement Rewards for College Scientists (ARCS) Foundation Scholar.

"As part of the graduate student experience, you are working on small tasks a piece at a time and it's easy to lose sight of the possible benefits the work as a whole might bring," Dawe explains. "In attending ARCS functions a couple of times a year, I was reminded of those benefits. Almost every ARCS member I talked to would say, 'My mother had Alzheimer's, so this is important work to me—thank you,' or something along those lines. I believe it really provided a morale boost that actually translated to my increased productivity."

Now an assistant professor at Rush University Medical Center, Dawe continues the research he began at IIT at the Rush Alzheimer's Disease Center, where he is part of a team examining characteristics of postmortem brains affected by Alzheimer's or at high risk for the disease. New ARCS Foundation Illinois Chapter President Pat Anderson says Dawe's steady progression from talented and focused student to accomplished and dedicated professional is what makes ARCS—the "ultimate grassroots organization"—so important to her and its other 64 members.

"We come together to work hard for a cause without the benefit of obtaining either monetary reward or prestige," Anderson says about ARCS, whose mission is to advance our nation's competitiveness by strengthening the United States' capacity for scientific and technological innovation. "What we do get is the sense of doing something that is beneficial to individuals and to our country, and the satisfaction of having done our job well. To be positioned for the future, we have to make supporting the sciences a national priority."

Now in its 36th year, ARCS Illinois is one of 17 autonomous chapters of the national ARCS Foundation and operates under a common National Board. Through 2012–13, the chapter has allocated cumulative awards of more than \$2.5 million to 407 students at five ARCS-sanctioned universities—IIT, Loyola Stritch School of Medicine, Northwestern University, the University of Chicago, and the University of Illinois at Urbana-Champaign. Since 1985, 34 IIT students have received the merit-based awards, which are renewable and can be used at the student's discretion.

Nurturing scientific minds comes naturally for Anderson, who began her two-year term as ARCS president in July. A Phi Beta Kappa and Phi Kappa Phi mathematics and physics graduate of the University of Delaware, where she met her future husband, IIT President John Anderson, she worked as a computer programmer, trainer, and consultant for more than 20 years.

"To be positioned for the future, we have to make supporting the sciences a national priority." -Pat Anderson

> Anderson's agenda for ARCS Illinois includes strengthening the advisory board, improving communications within the organization, increasing outside awareness of ARCS and its mission, and further refining the ARCS message. She also intends to focus on tracking former scholars like Dawe and promoting their outcomes.

"ARCS has been a strong voice in recognizing the need for our best young minds to consider research in engineering and science for many decades," says former IIT ARCS liaison Ali Cinar, director of IIT's Engineering Center for Diabetes Research and Education. "We are fortunate to partner with ARCS to recognize and reward the excellent research that our doctoral students are conducting at IIT."



ARCS Foundation: www.arcsfoundation.org ARCS at IIT: www.youtube.com/watch?v=8SysN3w4RXM Rush Alzheimer's Disease Center: www.radc.rush.edu/res/ext/home.htm

THE ART OF TURF

Lacrosse and soccer players are running, kicking, and throwing on the new Stuart Field, whose 93,542-square-foot grass surface was replaced this year with FieldTurf Revolution Series artificial turf. Carlos Hernandez, project supervisor for IIT Planning, Design, and Construction, says that the process of laying down the turf, a proprietary polymer formulation with an infill of layered rubber particles atop a very fine sand mixture, was quite the feat.

LINDIS TET

"Our timeline was the greatest challenge," he says. "The summer started off very rainy, which did not allow for any work to take place for several days. That put us behind schedule from the very beginning."

His team rallied and completed the multi-step installation—excavating, embedding infrastructure, prepping the ground, and laying the turf surface well before the semester began. With regular maintenance in the form of brushing, aerating, raking, and sweeping, the new Stuart turf is expected to last at least a decade.





Sticks and Stones Come to IIT

Smart. Crafty. Agile.

PHOTO: MICHAEL GOSS

According to Kirk Lamitie, IIT head women's lacrosse coach, they are the traits seen in champion lacrosse players. He looks forward to developing these characteristics in the student-athletes participating in the university's newest sports offering.

Lamitie is equally excited to be training his team on IIT's new Stuart Field, covered by artificial turf since late spring.

"I love turf; it is the best thing to happen to the sport," says Lamitie, who began playing at 15 and comes from a multi-generation lacrosse family. "Lacrosse is a spring sport that starts its season in January. If we did not have turf, we would be either be covered in mud or not be able to practice."

Developed by Native Americans and embraced by the French, the fast-paced sport of lacrosse is played with a stick (the *crosse*) that is used to throw, catch, and scoop a ball (originally made of wood, deerskin, clay, or stone) to score goals. Women's lacrosse differs from men's in that it

has more-limited stick contact and no body contact. After a shoulder separation ended his college lacrosse career at California State University, Chico, Lamitie made his coaching debut at Chico, helping the team take fourth place in the Western Women's Lacrosse League in both 2002 and 2003. An Albany, N.Y., native, Lamitie is busy establishing "East Coast lacrosse mentality" roots here in his Midwest region players.

"My 'East Coast' mentality is to build the player from a skills-training standpoint, which will lead to game play, and to teach a team first-game mentality," says Lamitie. "In the Midwest and other areas where lacrosse is still developing, many players are more interested in getting game experience than working on their skills. I focus on making sure the mechanics are perfect and that everyone on the field can be multifaceted in their skills."

The women's lacrosse team began its workout schedule in mid-September in preparation for its first competition, which will be a scrimmage against North Central College on Saturday, February 22, 2014. —*Marcia Faye*







My trip to Seoul, South Korea, _{to attend this year's international alumni}

meeting began in Beijing, China, where I spent the day with Hua Qu, director of the IIT office in China. Over tea, we talked about many things, both personal and professional. I remember thinking that for many prospective students from China, she is the first and often the only IIT person they meet before arriving in Chicago. The enthusiasm with which she spoke about the university was infectious. After our visit in Beijing, I left for South Korea encouraged that IIT has someone in China who believes its distinctive educational experience is a good fit for the young men and women she counsels.

In Seoul, in the company of more than 140 IIT alumni from Korea, China, Thailand, India, Taiwan, Japan, Hong Kong, and the United States, that feeling of excitement was magnified. These accomplished individuals recalled their time in Chicago and at the university with fond memories, and often spoke of how proud they were of IIT and the degrees they earned—in law, engineering, design, business, the sciences, architecture, and technology.

I had the opportunity to meet their spouses and their children. We spent time together at dinners and receptions, took a tour bus to the Korean Demilitarized Zone, and attended lectures at Korea University. Our discussions ranged from China's one-child policy to the political realities of living in a divided Korea. They asked for enrollment updates and were happy to see how our landscaping efforts had transformed the look of Main Campus. Many planned to make the trip next September to attend the first global alumni meeting ever held in Chicago.

I left South Korea with business cards, many hugs, and invitations to visit the next time I traveled to Asia. On my flight home, it struck me that in presentations about the state of the university our international alumni and students are represented largely by numbers and percentages. I was fortunate to meet some of them face-to-face. While our numbers may tell a great story about where IIT is today and where it is going, our students, alumni, faculty and staff make that story come to life.



IIT President John Anderson [bottom row, center] is joined by staff, alumni, and friends of the university community in Seoul, South Korea. Image used courtesy of IIT Alumni Association in Seoul, South Korea.

From seou

by JEANNE HARTIG Vice President for Marketing and Communications

A memorial remembrance at the Korean Demilitarized Zone

hile you may not have the opportunity as I did to travel abroad and become acquainted with some of our international alumni, on the following pages of *IIT Magazine* you can read how the university's global reach extends to nearly every continent on Earth.

Editor's Note: An IIT Magazine online exclusive on "The Origins of the IIT Asian Alumni Association" can be found at www.iit.edu/magazine.

An aspiring photographer lines up his <mark>shot</mark> at the National Folk Museum in Seoul.

his summer, six IIT undergraduates were given the chance "to rise up and go beyond" by expanding their educational and cultural horizons through the Research Internships in Science and Engineering (RISE) program. According to the IIT Study Abroad Office, more than 2,000 students from the United States and Canada applied to the 2013 program offered by the German Academic Exchange Service, which matches American and Canadian undergraduates majoring in biology, chemistry, physics, earth sciences, and engineering with research groups at universities and top research institutions in Germany.

"Apart from obtaining math, physics, and computer science knowledge, I gained an overall feel for what it is like to spend one's life in research," said RISE alumna Irina Papuc (PHYS '12) in a post-program testimonial about her work alongside physicists on an experiment utilizing the Large Hadron Collider. Papuc noted that because of her experience she better appreciated highly theoretical subjects, more easily seeing where they fit into the research puzzle. She is currently building an open-design platform called WikiDwell, noting that her physics experience opened her eyes to the benefits of open source.

Electrical engineering graduate student J. Sebastián Hurtado is currently fulfilling a six-month RISE Professional internship that pairs graduating seniors, and master's and doctoral students with German companies. After only one month at Nuance Communications in Aachen, he says that there is a universal language that is deeply understood, no matter the nationality.

"My coworkers have been really attentive to me and another international Ph.D. student, showing us new places, taking us to restaurants—and most important of all—talking to us like friends," says Hurtado.

Rising to the Research Challenge IN GERMANY

by MARCIA FAYE

J. Sebastián Hurtado

Major: Electrical Engineering RISE Professional Company: Nuance Communications Project: To improve automatic speech recognition (ASR) performance in noisy environments by speechsignal enhancement (SE) Research: Is developing a real-time

system that combines ASR and SE in such a way that software algorithms can be analyzed

Greatest challenge: "Getting to know how the ASR and SE software interact; it's always complicated understanding someone else's work, especially when you need to modify it and adapt it to a particular solution."

Favorite memories: *"Fischerstechen,* or water jousting, which happens once every four years, so I was quite lucky to be here. A parade goes around the city and ends on the Danube River. I also enjoyed a bike tour with three coworkers from UIm to Blaubeuren. The landscape was beautiful!"



Tim Maculewicz

Major: Mechanical and Aerospace Engineering RISE Institution: Technische Universität Berlin Project: To measure the noise generated by a controlled flame (with applications for reducing noise generated by combustion engines and turbines)

Research: Designed and machined components for the test burner and calculated, analyzed, and presented data

Accomplishment: "I designed a Bunsen burner attachment for the head of the experimental burner so that the flame would not undergo blowout under high pressure and lean conditions."

Favorite memory: "A friend and I took a weekend trip to Copenhagen. We planned to bike from Berlin to Rostock, on the Baltic Sea, and then to take a ferry to Sweden from which we would take a train to Copenhagen. The bike ride was incredibly difficult as it was on hilly terrain. It was beautiful, however, as we biked through plains and forests, and stopped in some very pleasant cities in between. We did not end up biking the whole way and decided to take a train halfway to save ourselves some pain."



Abhiroop Chattopadhyay

Major: Electrical EngineeringRISE Institution: Karlsruhe Institute of TechnologyProject: To determine how a low-power laser beam could be usedto predict wind speed in the vicinity of large offshore wind turbinesResearch: Designed and ran simulations of how the laser beamwould disperse and scatter in the atmosphereGreatest challenge: "The specific type of scattering we werestudying is a little-explored area of science. There are

no mathematical models to quantify results for this, and very little experimental data exists with which to corroborate our results. It is akin to saying that we don't know what would happen when a ball collides with another ball; the only way to find out is to actually make it happen." Favorite memory: "Traveling to the town of Füssen to see the fabled Neuschwanstein castle. You may never have heard of it, but your childhood is full of it as it's the model for most fairytale castles. It is a true delight for the eyes."



Whitney Theisen

Major: Architectural Engineering/Engineering Management RISE Institution: Bauhaus-Universität Weimar Project: To evaluate models in structural engineering Research: Learned the practical application of coding, and produced and formatted graphs and figures in MATLAB and AutoCAD Greatest challenge: "My Ph.D. student gave me a paper on the topics of sensitivity and uncertainty, and two MATLAB codes as examples. From the information in the paper and the codes, I had to understand the code, find if there were any mistakes in the code and fix them, reformat it all to fit the project the student was working on, and output the desired results from the samples gathered from the project." Favorite memory: "I visited family in Nürnburg. I had not seen them since I was three years old, so it was nice to reconnect and get to know them better. They also showed me around the city and took me on the Autobahn."







TAMING the Wireless WILDERNESS

A haystack of wireless gadgets is growing by the day. From cell phones, tablets, and laptops to e-readers, baby monitors, and satellite-guidance systems, these tools have become our steady companions.



s IIT faculty members Xiang-Yang Li (Ph.D. CS '01) and Erdal Oruklu (Ph.D. CPE '05) explain, there's trouble on the wireless ranch. Studies point to a 6,000 percent increase in

mobile-data transmission since the advent of smartphones, threatening the entire system with a snarl of virtual traffic.

"All wireless communication signals travel over air using a specific radio frequency, or spectrum," Li says. "If multiple stations transmit over the same radio frequency simultaneously in the same location, the result is interference and signal loss for the receivers."

One promising approach to an overpopulated spectrum—cognitive radio (CR)—is the focus of Li's and Oruklu's new project, funded by a \$498,122 grant from the National Science Foundation.

> Li is a professor in the Department of Computer Science and director of IIT's Wireless Network Research Laboratory. He has been actively involved in the design and instrumentation of two large-scale wireless networking systems, GreenOrbs and CitySee, which carry out real-time ecological surveillance through thousands of

wireless sensor nodes in an urban section of Wuxi City, China.

Oruklu, an associate professor in the Department of Electrical and Computer Engineering and director of the Very Large Scale Integration and System-on-a-Chip Research Laboratory, will oversee hardware and software development as well as related circuits for CR devices.

As Li, principal investigator on the project, explains, "Cognitive radios are capable of monitoring, sensing, and detecting the conditions of their operating environment, and they can dynamically reconfigure their own behavior to best match those conditions." In order to prevent frequency bands from becoming clogged with messages, CR devices can talk to their neighboring devices and make appropriate choices. "In other words," Oruklu says, "CR can achieve improved spectrum efficiency by optimizing the use of shared frequencies."

To maximize spectrum availability through CR, a process of opportunistic spectrum access (OSA) is applied. This involves not only an evaluation of the existing frequency spectrum but also optimization of the temporal domain (by exploiting traffic patterns) and the spatial domain (by exploiting rarely used geographic regions).

"Although OSA has many benefits," Li says, "a number of challenges—including spectrum sensing, management, mobility, sharing, security, and

efficiency—must be resolved before we can design an efficient wireless network system adopting it."

Smart radio devices that optimize spectrum use require wise governments to implement the advances. In the case of the United States, the Federal Communications Commission presented the National Broadband Plan to Congress in 2010, with the aim of freeing up an additional 500 MHz of spectrum for wireless



A mounted wireless sensor node used to collect data in Wuxi City, China.

broadband use by 2020 to meet demand.

Li and Oruklu hope that cognitive radio strategies will play an integral part in a more robust wireless universe. They will apply and verify their methodologies and algorithms over the CitySee and GreenOrbs systems as well as a cognitive radio network in their laboratory.

MORE 🙆 NLINE



And the second s



gold rush for new energy forms is unfolding halfway around the world. Daniel Magasanik (Ph.D. GT '63), a 40-year resident of Melbourne, Australia, is in the thick of it. He works in two of the liveliest—and sometimes contentious—domains: natural gas and renewable energy.

"Over the last 30 years, the energy sector has been a rapidly developing, chaotic, and fascinating area," he says. "I wanted to focus my efforts here and apply my expertise."

Magasanik's interest in energy began during his early schooling at McGill University in Montreal, where he earned his undergraduate degree in chemical engineering in 1957. After graduation, while working for a petrochemical complex in Louisiana, he accepted a fellowship at IIT's Institute of Gas Technology. After receiving his doctorate, he taught classes and continued to pursue his interests in conventional energy forms as well as clean energy alternatives particularly fuel cell technology.

Through a series of unlikely circumstances, Magasanik migrated to Australia in 1969, taking a position with the newly formed Oil and Gas Division of the continent's largest company (now BHP Petroleum of BHP Billiton). "I left BHP in 1972 but stayed in Australia, where I established a consulting firm focusing on natural gas and electricity," he says. "More recently, this has included renewable energy sources and their conversion to usable forms."

Indeed, McLennan Magasanik Associates was one of Australia's leading consultancies specializing in the energy industries until it was taken over by a large engineering company in 2010. Magasanik was also the foundation director of the Energy Research and Development Corporation, an organization funded by the Australian government, focusing on energy efficiency and reducing environmental impacts. Currently, he works on a part-time basis for Marsden Jacob Associates, offering policy advice, due diligence, strategic planning, feasibility studies, and project implementation.

As an authority on Australian gas markets, Magasanik has helped to guide gas-fired electricity generation projects for a range of clients in Victoria, Western Australia, South Australia, Queensland, New South Wales, and Tasmania, as well as overseas. One such project involved a detailed empirical analysis, leading to the first onshore development of natural gas on the east coast of the Malay Peninsula. In Australia, coal still accounts for nearly 80 percent of the country's electricity generation. "We have very high-quality and cheap-to-mine coal—very low in sulfur and reasonably low in ash," Magasanik says. This, combined with high-energy consumption for transportation, has made the country the highest per capita emitter of carbon dioxide among developed countries.

Australia's mammoth reserves of natural gas—among the largest in the world—have been touted as a means to help wean the country from its coal addiction, as well as a potential boon for the domestic economy.

As Magasanik notes, however, Australia's efforts to supplant coal use with natural gas have recently run aground. While an aggressive effort is underway to exploit reserves of coal-seam gas and shale gas mostly in the eastern part of Australia—the majority of this resource is being exported for sale as liquefied natural gas to the highest bidder. The net effect has been to increase domestic natural gas prices, making gas less economically competitive than coal for electricity generation.

With coal yielding roughly twice the carbon dioxide per unit of electricity generated when compared with natural gas, this development is not good news for environmental efforts to reduce coal use. Magasanik hopes that at least some of this coal will be offset by rapidly growing renewable energy forms. His biggest contribution to clean energy development is through Hepburn Wind, Australia's first community-owned wind farm, located in Victoria, near the Wombat State Forest.

Local residents, frustrated with government inertia on climate change, decided to take their own initiative and launched the ambitious clean-energy project in 2007, with generation commencing in June 2012. Magasanik currently serves on the board of Hepburn Wind, which features a pair of 2.05 megawatt high-tech wind turbines. The turbines, capable of powering more than 2,000 homes in the surrounding area, were affectionately dubbed Gale and Gusto by a youngster who won a naming competition among community schoolchildren.



Wind turbines Gale and Gusto of Hepburn Wind, Australia's first communityowned wind farm

The naming contest is an example of the cooperative spirit of the project, which has benefitted from enthusiastic public engagement since the outset. "We raised almost \$10 million from cooperative members, of which there are around 2,000," Magasanik says. "Our borrowings are under \$2 million and in addition we received grants of almost \$2 million from the state government."

In addition to electricity, area participants benefit from a generous community sustainability fund, which has provided grants for a broad range of projects to nourish the local area. These include investigations of novel species in the nearby Wombat State Forest and investment in Men's Sheds, a flourishing countrywide program designed to improve health and foster social interaction.

Hepburn Wind's modest farm is expected to offset some 12,200 tons of carbon dioxide—the equivalent of planting 45,523 trees every year. The project has inspired green initiatives for wind, solar, bioenergy, and mini-hydro projects across Australia.

"We are the successful example of what can be done," Magasanik says.



Hepburn Wind: http://hepburnwind.com.au Australia's natural gas boom: http://grattan.edu.au/publications/reports/post/getting-gas-right-australias-energy-challenge







By MARCIA FAYE

chool of

"Citizens of western DuPage County ... " the guitarist purred into the microphone before erupting into the maniacal sentence-ending shout, "... LIGHT UP!" Many in the cheering crowd did just that, flicking open lighters and hoisting them high, in a tradition made popular at arena rock concerts of the '70s and '80s. Acknowledging the audience response, James Vincent "J. Y." Young (MAE '70)-a lead guitarist and vocalist of the band Styx-smiled, sidled up next to his co-lead guitarist/vocalist, Tommy Shaw, and launched into "Light Up" from the band's 1975 album Equinox. The scene seemed a mutual musical high shared by the boys in the band and their thousands of fans at this summer's Naperville (Ill.) Exchange Club's Ribfest 2013.

Members of the band Styx: [top, left to right] Chuck Panozzo, Ricky Phillips, Todd Sucherman [bottom, left to right] James "J. Y." Young (MAE '70), Tommy Shaw, Lawrence Gowan Playing a set list that included hits such as "Renegade," "Come Sail Away," and "Lady"—the song that propelled the Chicago-bred group into rock stardom—the present incarnation of the band performed before a crowd that spanned the generations from grandparent to grandchild. That Styx—now composed of Young, Shaw, Lawrence Gowan (vocals/keyboards), Ricky Phillips (bass guitar), Todd Sucherman (drums), and occasionally, original Styx bassist Chuck Panozzo—can appeal to such a wide range of ages both humbles and astounds Young, who joined the group the same year that he graduated from IIT.

"Music communicates to everyone on a personal level and truly has the power to even heal," says Young in a phone conversation from Baton Rouge, La. He notes that band members have received mail over the years from fans who have written that certain Styx songs have helped to save someone's life or have shepherded the writer through difficult times.

** "Music communicates to everyone on a personal level and truly has the power to even heal." -James "J. Y." Young

"I used to view my career choice as something that is completely egocentric and self-serving, and in some ways, it is," says Young. "But when we get these letters, I recognize that we have a tremendous responsibility; I think we've done a reasonably good job of coping with that responsibility. And by going out and performing live concerts, we see that more and more young people under the age of 30 are becoming fans, too."

Young was, well, quite young when he began to play his first instrument, a piano. Music was a language commonly spoken in the Young household in Chicago's Auburn/ Highland neighborhood. Young's parents started all of their children—Young, his two older sisters and two younger brothers (including Rick, who passed away in 2000)—on piano at age 5. Rather reluctantly, Young also took up the clarinet for several years, but weaned on the Beatles, at age 14 he became "enchanted" with his uncle's new classical guitar. Young's fingers took flight on the strings, as did his dream to become a professional rock musician.

While a student at the former Calumet High School, Young and his brother Rick, also an aspiring rock musician, formed the band The Catalinas and placed third in a regional contest, securing themselves a place in a "Talented Teen of America" tour of Canada and Europe. Young also discovered his aptitude for mathematics and science, and his father urged him to obtain a college degree. Knowing that his uncle Sheldon Young (CE '44), an inventor, had graduated from IIT and founded the Vibro/Dynamics Corporation, a successful vibration isolation and shock control company, Young enrolled at the university while forming a new band, Monterey Hand, with his brother.

Soon after he graduated from IIT and in between his gig driving a taxi, Young successfully auditioned for the Chicago band TW4—composed of Dennis DeYoung (lead vocals/ keyboards), John Curulewski (lead guitar), Chuck Panozzo (bass), and John Panozzo (drums). In 1972, the TW4 members changed their name to Styx. While Young admits that a career in the mechanical and aerospace engineering field was his "fallback position," he says his degree paid off in more ways than he could have imagined.

"My education prepared me to solve real-world problems using math and science," he explains, "and to be able to make judgments about advancements in technology as they came along, finding ways to apply them to what we did. A couple of times I was laughed at—I won't mention by which of my colleagues in the band—when I suggested we get involved in digital recording, which would become a standard we would choose to use."

Young says that besides his family connection to IIT, which includes his brother-in-law Kent Godsted (ME '66), four classmates have had highly influential roles over the course of his life: James Morrin (MAE '71, LAW '76), who was Young's personal attorney for many years; the late Dave Yoshinari (EE '70), inventor of a custom-made guitar pedal; Paul Petraitis (DSGN '71), who influenced Young's musical tastes; and Steven A. Jones (DGSN '71), movie producer and the creative mind behind all of the visual content used on Styx's bigscreen tours, including *The Grand Illusion/Pieces of Eight* tour and DVD.

"Dave Yoshinari sat next to me in Engineering Orientation during my first semester," recalls Young. "He invented a device—the Yoshinarator—that carried me through the height of Styx's heyday as a recording act. That thing was amazing. We sat in his basement in Norridge, Ill., and he kept changing transistors with distortion, back in those days, and they all distorted differently. I was trying to play the start of Jimi Hendrix's 'Foxy Lady' and we sat there until Dave found a transistor that worked."

More than four decades have passed since Young shared a classroom with Yoshinari and lived in IIT's Fowler Hall, "10 blocks north of the old Chess Studios at 2120 South Michigan, where blues artists and some of the Chuck Berrys of the world recorded," he says. Styx has since gone global, playing concerts from Aruba to Japan, and scoring a number-one hit with "Boat on the River" in Austria, Germany, Israel, and Switzerland. The band averages 110 live shows each year and has sold some 30 million records worldwide. In the 1980s, Styx







[Top left] A 20-something "J. Y." in the early days of Styx [Top right] The Yoshinarator [left] was a sound device developed for "J. Y." by Dave Yoshinari (EE '70).

[Left] James "J. Y." Young rocking the house at a 2010 concert.

was nominated for a Grammy Award and had four consecutive multi-platinum albums as certified by the Recording Industry Association of America.

"I could write a book on what it was like watching from up close as my friend went from cab driver to superstar," says IIT alumnus Jones, who was playing a bass guitar in the Farr Hall student lounge while in his first year at IIT, when alumnus Petraitis introduced him to Young. "I was excited and happy that 'J. Y.' had 'made it,' and I'd be lying if I didn't admit, as a musician myself, to a bit of envy. In hindsight, no one deserves success more than James V. Young."

Editor's Note: An IIT Magazine online exclusive profile of Steven A. Jones (DSGN '71) can be found at www.iit.edu/magazine.



StyxWorld: www.styxworld.com Making of *Styx: The Grand Illusion/Pieces Of Eight Live* DVD www.youtube.com/watch?v=8NPwSOu9OUg&feature=player_embedded

SOUTH AMERICA





by MARCIA FAYE

FLOWER POWER

As co-founders of Global Petals, Parth Kapadia (CE '13) and his business partner, Michael Lyons, have nothing against making time to stop and smell the roses, literally. But for the past two years, they have made their top priorities running their international floral enterprise and establishing its unique cross-continental supply chain. "By working directly with the grower and through our technology, we are able to deliver roses that last two to four weeks long, have heads the size of your palm, and promise reliable consistency." nspired by his 2011 study-abroad experience living with an Ecuadorian rose farmer, Lyons, a University of Illinois at Urbana-Champaign business alumnus, contacted Kapadia to discuss the idea for a global online floral marketplace. Kapadia was intrigued but not surprised, noting that he and Lyons have always been big thinkers. When they were students at Waubonsie Valley High School in Aurora, Ill., they assembled a mock stock portfolio that included shares of Apple. Although the joint portfolio never came to fruition, Lyons and Kapadia individually purchased Apple shares along with other equities. As the market rebounded, they obtained a windfall that provided their initial investment for Global Petals.

With Global Petals, Kapadia and Lyons envisioned a company driven by design and distinguished by transparency, technology, and top-notch customer service. Kapadia says that the nature of the floral market often makes obtaining products stressful and unpredictable. By eliminating key problem variables, the company ultimately helps to augment design.

"We recognized that florists are designers first and business individuals second," he says. "The buying process should be easy, reliable, and people-focused."

A former Kern Innovation and Entrepreneurship Academy Scholar, Kapadia received a grant from IIT in early 2012 that allowed Lyons and him to travel together to Ecuador to meet with farmers, trade organizations, and logistics companies. The trip helped the pair to devise a one-of-a-kind technological infrastructure to move flowers across the globe.

"Global Petals is able to fulfill an order within four to five business days. We contact our specific premium-quality farm, which hand selects and cuts the flowers, then prepares them for shipping to the florists. By working directly with the grower and through our technology, we are able to deliver roses that last two to four weeks long, have heads the size of your palm, and promise reliable consistency," Kapadia explains.

The hand-selected Ecuadorian farms that Global Petals partners with are located in year-round spring-like conditions because of their proximity to the equator, and thrive in the area's highaltitude environment. Kapadia says that most of the flowers, including roses, carnations, hydrangeas, lilies, and a variety of filler plants, are grown in massive greenhouses that do not require air conditioning, and this helps to keep prices low. Karin Schneiders, owner of Celidan Creations in Naperville, Ill., recalls some of her favorite Global Petals roses.

"We've used the roses especially for weddings; the hot pink, lavender, and yellow with red edging are all gorgeous," says Schneiders, who has been in the floral trade for 28 years. She says that she especially appreciates that Global Petals has eliminated the middleman and spends the extra time ensuring that their customers are satisfied. "I've been very happy and impressed with Michael, who will come by the shop to check on the quality of the flowers, as well as with Parth. Global Petals is doing me a big favor with its great products."

Kapadia and Lyons are looking to cultivate new directions for their business. Kapadia attended a manufacturing and design certification program this summer at Beijing Institute



of Technology, where he learned how vases, ribbon, and other design items could be produced and offered through Global Petals in the future. In September, Kapadia and Lyons attended an exporting fair at Chicago's Navy Pier to explore opportunities for building relationships with flower farmers in Colombia.

Last year, Kapadia and Lyons were invited to discuss Global Petals with Santiago León, Ecuador's former minister of coordination, production, employment, and competitiveness.

"Meeting with one of the then-highest-ranking diplomats in Ecuador was an incredible experience," says Lyons, "and made us realize that regardless of our youth, we can still be respected as global agents of change and progress."



Global Petals: http://globalpetals.com Ecuador: http://travel.state.gov/travel/cis_pa_tw/cis/cis_1106.html

Global Petals works with the family-owned flower farm RG Flowers to provide florists with high-quality roses and filler plants.

Building a Library and

By Marcia Faye With Colleen Humer, Adjunct Assistant Professor IIT College of Architecture

Photos: Frank Flury

Ghanian students using the library/study space constructed through an IIT College of Architecture design/build project

Community in Ghana The rural village of Twifo Hemang, Ghana, was home this summer to a group of IIT College of Architecture students and alumni, who, under the leadership of Associate Professor Frank Flury, built a library/study space for secondary school students.



The two-semester design/build project, completed in July, came to fruition through a suggestion made by Ghana native Teddy Mensah (ARCH '13), who had worked with Flury on an earlier design/build project.

"I believed that this project would bring different communities together to take on a common issue," says Mensah, noting that design/build projects offer students the opportunity to understand team building and problem solving in real-world situations. "The idea that it came true gives me hope. It shows how people can commit to a cause and how strong that force is."

The IIT students became acquainted with many members of the Twifo Hemang community—from the children, who teased them each day, to Chief Otumfuo Amoa Sasraku III, who made the erection of the building possible.

"By living in a small community for two months, we got to understand the culture," says Penelope Phylactopoulos (ARCH '13). "The locals made us feel welcome, like Johnathan, who worked at the corner market and would always find a way to show his appreciation for the project, which was very motivational."

One unique aspect of the Ghana design/build project was that the library building was made entirely with hand tools; the students ripped boards using handsaws and even mixed concrete manually. They also built furniture and shelves with the help of faculty member John Kriegshauser, who runs the college's shop program. In their first year of study, IIT students begin the process of learning to use tools; by the fourth and fifth years, some, like the 16 students in Ghana, build a complete building.

The library building—one enclosed room attached to a covered outdoor space—is concrete with an outer wall of custom-made blocks featuring a leaf pattern. Not just decorative, the perforated skin allows for ventilation of the building while also giving the structure its notable character.

Fifth-year architecture student Oluropo Sanni admitted that while he had never worked so hard in his life—10 hours a day at six days a week of manual labor—the team's work on the project was worth the effort.

"It not only gave us field experience but also allowed us to make an impact in the lives of the local community," he says.

Mensah and Flury are hoping to erect a second building in another village during summer 2014. ■

MORE CNLINE

Studio Ghana Library: www.studioghanalibrary.com Frank Flury: www.frankflury.com



[Clockwise, from far left] East elevation showing the volumes of the building Ghanian students Detail of the custom-made screen blocks allowing cross-ventilation IIT architectural students building formwork





Making Tracks on His Way to the Fast Track

When **Emmanuel Klu (CS '13)** asked his parents' permission to leave their home in Ghana and travel to the United States to attend IIT, none of them likely anticipated the miles Klu would log elsewhere throughout the world. An intrepid backpacker, Klu has visited 21 states and six European countries; this summer, he returned to Africa, where he and his girlfriend visited Ethiopia and spent a day in Egypt. Klu concluded this latest trip by jumping into a journey of a different type—his new role as a software engineer with the corporate engineering team at Google in Mountain View, Calif.

"This is an exciting opportunity to work on something new in a small team," says Klu, who began his job on September 3. "I believe that it gives me the chance to contribute directly to innovation at Google, and at a very fast pace."

Klu also keeps a fast pace on his bicycle, which he uses to traverse the 10 miles between his Santa Clara townhouse and the office.

"I get in a workout and contribute to the green initiative," says Klu, who was involved in charitable activities during his years at IIT. "Google has a self-powered commuting program that allows employees to donate money to their favorite causes, so that's more motivation for me to bike each day."

Klu, the Commencement 2013 student speaker, has already joined the IIT Northern California Alumni Chapter and has met with fellow graduates in the Bay Area. A former Leadership Academy Scholar, he plans to stay involved in the academy and serve as a mentor with such organizations as the National Society of Black Engineers and the Society of Hispanic Professional Engineers. *—Marcia Faye* CAMPUS $|\forall|$ an internat

HOTO: MICHAEL GOSS

Number of Living Alumni = 69,439

% of undergraduates who are classified as international students

24%

% of graduate students who are classified as international students

alumni chapters



Number of countries represented by IIT's total student body



For exclusive online content and more about IIT's global impact, go to:

iit.edu/magazine

Share Your News!

We want to hear from you! Send us your class note at **alumni@iit.edu**.

classnotes

1940s

Burton Lewis

(CE '48), Chicago, was presented with the 2012 Structural Engineers Association of Illinois (SEAOI) John F. Parmer Award for service to the profession on June 8 at the SEAOI Annual Awards Dinner. The award honors a structural engineer whose distinguished career is acknowledged by his peers as an example of excellence.

Charles Ticho

(EE '48), Hackensack, N.J., wrote a book about his family's experiences during the Holocaust and life in their new home in the United States. The book has a section about Ticho's IIT days with recollections of the student plays by the Rough Castings theater group, the jazz music recitals staged by Professor S. I. Hayakawa, and other anecdotes.

1950s

Edward Rosen (CHE '51, M.S. '53),

Chesterfield, Mo., is the 2013 recipient of the CACHE Award given by the American Society for Engineering Education for significant contributions in the development of computer aids for chemical engineering education. He retired from the Monsanto Company in 1994 and served as an Accreditation Board for Engineering and Technology program evaluator from 1987–2009. Rosen is a fellow of the American Institute of Chemical Engineers.

Norman Laliberte

(DSGN '54, M.S. '55), Nahant, Mass., had the exhibit Exuberance 2013: The Varied Expressions of Norman Laliberte featured in all seven galleries of the King Hooper Mansion through the Marblehead Arts Association. An artist, teacher, author, and book illustrator, Laliberte has been featured internationally in more than 150 exhibits. His large body of work encompasses prints, paintings, mixed-media pieces, sculptures, and book illustrations.

Gary Blank

(EE '59), Elgin, III., was elected IEEE-USA president 2014. IEEE (Institute of Electrical and Electronics Engineers, Inc.) is the largest professional technical society in the world, with membership of 440,000 internationally in 160 countries.

1960s

Mark Donchin

(ARCH '61, M.S. '64), Los Angeles, is the coauthor of The Collaborators: Interactions in the Architectural Design Process, a compilation of case studies of the cooperative ventures of architects and clients, architects and engineers, and architects and architects, from Ashgate Publishing Ltd.

Robert Gordon

(ARCH '63, M.S. CRP '67), Chicago, had a group of prints entitled "Architecture in the Landscape" shown in the exhibition Terra Firma at Marya Veeck's August House Gallery. The group included color prints in various mediums, metal plate engravings, stone lithographs, and silkscreen prints. Gordon chooses his print subjects from the thousands of sketches he makes in his travels around the globe. IIT's Paul V. Galvin Library Archives has acquired a substantial collection of his original artwork and architectural drawings for viewing by scholars and art lovers. In addition to Chicago, Gordon's work has been exhibited in galleries in Paris and San Francisco.

Melvin Hoffman

(ENGL '63, M.S. LING '65), Kenmore, N.Y., is professor emeritus of English at Buffalo State College, where he taught for 40 years.

Vincent Sowa 🌐

(DSGN '65), Wallenstein, Ontario, has retired from Conestoga College after 40 years of teaching industrial and graphic design. He still teaches at McMaster University in Hamilton, where his students placed second in the 2013 Canada-wide Minerva Canada James Ham Safe Design Awards contest.

Leon J. Hoffman

(PSYC M.S. '69, Ph.D. '70), Chicago, continues to enjoy his private practice of psychology and his lifelong connection to chamber music as a cellist.

Takao Kobayashi

(M.S. MEC '69, Ph.D. '72), Morgan Hill, Calif., is a senior staff scientist at the Center for Fracture Physics at SRI International. He also published a failure analysis paper in the December issue of *Journal of Failure Analysis and Prevention* that was selected for the Best Paper Award for 2012. The award was presented at the American Society for Metals Leadership Awards Luncheon in Montreal on October 28.

1970s

William Schiemann

(PSYC '71, M.B.A. '73), Lebanon, N.J., was appointed to the board of directors of HR Certification Institute (HRCI) in May for a two-year term. HRCI is the global leader in developing rigorous exams to demonstrate mastery and realworld application of forwardthinking HR practices, policies, and principles.

Stanley Eng

(CE '72), Bellevue, Wash., is a construction engineering manager for Perteet, Inc., a consulting firm providing a diverse selection of engineering services to the public and private sectors.

Lorenz Biegler

(CHE '77), Pittsburgh, has been inducted into the National Academy of Engineering.

Kerry Peck

(LAW '78), Wilmette, III., a litigation attorney with Peck Bloom, LLC, was recognized in *Super Lawyers Magazine* for 2013. This is the second time Peck has been named a "Super Lawyer." He is past president of the Chicago Bar Association and serves as a member of the American Bar Association's Commission on Law and Aging.

Lynn Claudy

(M.S. EE '79), Vienna, Va., is senior vice president for technology at the National Association of Broadcasters.

Michael Daniel

(M.S. BIOL '79), Orinda, Calif., is acting vice president for regulatory affairs for SinuSys Corporation, an innovative sinus-health company.

Jonathan Jaffe

(MGT '79, M.S. OTM '97), Gallatin, Tenn., was granted a patent in April for "A Railway Tie of Non-Homogeneous Cross Section Useful in Environments Deleterious to Timber." It adds to his portfolio of more than a half-dozen patents in diverse fields of information theory, indigenous authentication, financial equities investment selections, and advanced designs for railway ties.

1980s

Paul Farah (EE '80), Los Altos, Calif., is vice president of engineering and chief technical officer at Scholar Planet.

Hachemi Moumed 🌐

(FPSE '80, M.S. OR '80), Algiers, Algeria, is a health, safety, and environment manager at Sonatrach, the largest oil and gas company in Africa.

Bridgette Young Ross

(MGT '80), Nashville, Tenn., is the assistant general secretary for college ministries in the **Division of Higher Education** at the General Board of Higher Education and Ministry of the United Methodist Church. Ross has a Master of Divinity from **Gammon Theological Seminary** at the Interdenominational Theological Center. Before hearing the call to ministry, she spent 10 years in corporate America in sales, marketing, and human resources. This May, she delivered the baccalaureate address to the Claflin University Class of 2013.

Victor Tsao

(M.S. CS '80), Newport Coast, Calif., celebrated the 25th anniversary of the founding of his iconic networking-hardware company Linksys. Cisco Systems, Inc. acquired the company in 2003 and recently sold the Linksys division to Belkin International, Inc.

Stephen Gallagher

(MGT '81), San Francisco, is vice president of construction for Trumark Urban, a division of Trumark Group of Companies that is focused on developing condominiums in San Francisco's underserved market. A veteran real estate developer and design consultant, Gallagher formerly worked at both Tishman Speyer and Cushman & Wakefield, among other firms.

Michael Hill

(CS '82), Baltimore, is a program manager and senior systems engineer at PROARC, Inc.

Gunupati Prasad 🌐

(CHE ^{'82}), Hyderabad, India, is chairman and chief executive officer of Dr. Reddy's Laboratories Ltd.

Alfred Swanson

(LAW '82), River Forest, III., a Cook County Circuit Court judge, was profiled in the May 15 edition of the *Chicago Daily Law Bulletin* about his career change from radio news journalist to judge. The Illinois Supreme Court reappointed Swanson to the bench for a term that runs through December 1, 2014.

Cheryl Hudson-Jackson (MGT '83), Round Lake, III., is director of operations and human resources at YWCA Lake County in Gurnee.

Terrence Lavin

(LAW '83), Chicago, is a member of the Illinois Appellate Court. A former civil trial attorney and adjunct faculty member at IIT Chicago-Kent College of Law, Lavin is past president of the Illinois State Bar Association, the Society of Trial Lawyers, and the Chicago-Kent Law School Alumni Association.

Stanley Schachne

(ARCH '83), Davie, Fla., and Donna Schachne of Schachne

Architects & Builders were awarded a 2013 Community Appearance Award from the City of Fort Lauderdale for the renovation of a historic 1939 bungalow residence.

John Thode

(M.S. EE '83), Lake Zurich, III., is president of DigitalOptics Corporation, which delivers innovation in imaging systems for smart phones. Thode was most recently at McAfee, Inc., where he was executive vice president and general manager of the Consumer, Mobile, and Small Business Unit.

Soliman Khudeira

(CE '84, M.S. '87, Ph.D. '99), Chicago, was elected to the board of directors of the Structural Engineers Association of Illinois for 2013-14. She is currently working on a bridge project in Nicaragua.

Robert Acker

(CE '85), Park Ridge, III., was promoted to vice president of GEI Consultants, Inc., one of the nation's leading geotechnical, environmental, water resources, ecological science, and engineering firms.

John Allen

(M.B.A. '85), Lisle, III., is executive vice president and chief operating officer for Navistar International Corporation. A 31-year veteran of Navistar, Allen was president of the company's North America Truck and Parts business.

Michael McGreal

(FPSE '85), Tinley Park, III., is founder and president of Firedyne Engineering, P.C. The firm is celebrating its 20th anniversary this year.

Bruce Heyman

(M.S. EE '86), San Juan Capistrano, Calif., principal at BHD Consulting, is serving as project manager overseeing the building of a fully functional and historically accurate recreation of the San Salvador, the flagship of Juan Rodríguez Cabrillo, the first European explorer to navigate the coast of present-day California. The project is through the San Diego Maritime Museum.

Christopher Hayward

(EE '87), Bedford Corners, N.Y., managing partner and chief operating officer of Highbridge Capital Management, received a Leadership Award from PENCIL, a New York City-based nonprofit that improves school and student performance by creating innovative programs that target the intersection of school needs and business

expertise. Hayward also serves as the treasurer of PENCIL's board of directors.

Rajeev Chandrasekhar 🌐 (M.S. CS '88), New Delhi, India, was one of 15 individuals from around the world nominated for a 2013 Index Award for Freedom of Expression. Chandrasekhar was nominated in the Digital Freedom category by the United Kingdom-based organization.

Tomoko Ichikawa

(M.S. DSGN '88), Chicago, is a visiting assistant professor at IIT Institute of Design.

1990s

Gregory Harris

(LAW '90), Buffalo Grove, III., is the coordinator of the firstever all-Jewish Baseball Player art project, a print of current and former Jewish players,

executives, and celebrities signed by 35 of the individuals depicted. Harris traveled the country to have 500 prints autographed. To date he has raised nearly \$100,000 in sales proceeds to help support numerous charitable organizations.



Francissen (M.S. EE '91), Seattle, joined the Intellectual **Property and** Technology Practice Group

of Lane Powell as shareholder. Francissen focuses his practice on intellectual property matters and related counseling, including patent and trademark litigation, preparation, prosecution, licensing, and acquisition.

"I love IIT and can't picture myself attending any other school. Thanks to my scholarship, I'm able to get an excellent education without placing a financial burden on my family."

—Lissette Ayvar (ME 3rd year)

Fueling Innovation: The Campaign for IIT is the \$250 million fundraising campaign that is propelling IIT into the top tier of the world's universities. One key initiative of the campaign is to open the doors to a twenty-first century education for talented students.

You can open doors for deserving students like Lissette Ayvar with your annual gift to the IIT Alumni Scholarship Fund or a scholarship of your choice.

Visit fuelinginnovation.iit.edu for more information.

fuelinginnovation

(Marilyn)² + CGA = Win x Win!

"I am giving to IIT while I am alive. It is an investment in the future of education."





"I am where I am thanks to IIT. My education was the best insurance policy I bought."

MARILYN W. JOHN

Marilyn J. Kouba (CHEM '50, M.S. '63) and **Marilyn W. John** (TD '56, M.S. EG '62) remember the campus back in the 1950s. Female students in the sciences or engineering were a rarity. "It was a different time," they both say with a laugh.

MARII YN KOUBA

Now retired, these career educators—Kouba taught chemistry for more than 35 years in the City Colleges of Chicago while John spent more than three decades on the faculty of the University of Wisconsin-Milwaukee credit their IIT education for their accomplishments.

Kouba and John recently made planned gifts to the university becoming members of the Gunsaulus Society. A charitable gift annuity (CGA) allows them to support their alma mater while receiving a fixed income.

Charitable Gift Annuity (CGA) **BENEFITS**

- Receive dependable, fixed income for life in return for your gift
- In many cases, receive payments at a rate higher than the interest you are currently receiving from stocks, CDs, or savings accounts
- Receive an immediate income-tax deduction for the portion of your gift
- A portion of your annuity payment will be tax-free

If you have named IIT as a beneficiary of your estate plan through your will, trust, IRA, or retirement plan, please let us know so we may acknowledge your generosity and include you as a member of our esteemed Gunsaulus Society.

Visit **www.iit.edu/giftplanning** to begin learning about how you can benefit from these giving methods and more. Contact Stuart Gold, director of gift planning, at giftplanning@iit.edu or 312.567.5020.

Gunsaulus | SOCIETY

Stephen Lesavich (Ph.D. CS '91), Kenosha, Wis.,



coauthored the book The Plastic Effect: How Urban Legends Influence the Use and

Misuse of Credit Cards. The book examines 25 of the most common urban legends that affect credit cards, debit cards, credit reports, and credit scores, and includes self-help information for consumers who are having trouble managing their credit cards and credit card debt.

Stephen Burks

(DSGN '92), New York, is owner of Readymade Projects.

Jeffrey Drobick

(EE '92), Livermore, Calif., is chief product officer at Tapjoy, Inc., a leading mobileadvertising and publishing platform. He was most recently president and chief executive officer of Geeknet Media.

James Raflores

(ME '92), Plainfield, III., is a sales engineer at Petrak Industries, Inc., specialists in fluid and gas systems.

Mehmet Yazici 🌐

(M.S. CHE '92, Ph.D. '96), Gebze Kocaeli, Turkey, is employed at the TÜBITAK MAM Energy Institute.

Brian Switzer 🌐

(M.Des. '93), Buehlertal, Germany, is a professor of communication design at Hochschule Konstanz.

Kim Erwin

(M.Des. '94), Evanston, III., assistant professor at IIT Institute of Design, published *Communicating The New* in August. She provides a framework and methods to address five distinct moments where effective communication proves critical for innovation.

Christopher Renoud

(ME '94), Bellingham, Wash., is president and chief executive officer of Fiberglass Structural Engineering.

Steven Nargang

(ME '96), Oak Brook, III., is vice president at Gage Consulting Engineers. He has been a licensed professional engineer since 2000 and leads development for Gage.

John Abramic

(CHE '97, LAW '01), Naperville, III., is a patent litigator in the Chicago office of Steptoe & Johnson LLP.

Dee Waddell

(M.B.A. '99), Manassas, Va., graduated with a doctorate in management from the University of Maryland University College in May. He also became senior vice president and chief information officer with Universal Weather and Aviation, Inc., the global leader in business/corporate aviation trip management.

2000s

Sohail Niazi () (M.S. FIN '00), Sultanate of Oman, is chief Islamic banking officer of Maisarah, a branch of BankDhofar. Niazi came to Maisarah from Elaf Bank, where he was acting chief executive officer.

Hazem Dawani

(CPE '01), Chicago, is president and chief executive officer of OptionsCity, which won a Chicago Innovation Award in 2012. The company developed algorithms for a computer that tells it not just what to trade, but how to trade and when to trade—all based on historical comparisons among different markets, and all executed in microseconds.

Brian Leahy

(Ph.D. PSYC '01), Chicago, is director of neuropsychology services at Alexian Brothers Medical Center.

Christine Freisinger

(ARCE '02), Chicago, was elected to the board of directors of the Structural Engineers Association of Illinois for 2013–14. She is also the professional mentor for the IIT Chapter of Engineers Without Borders and is currently working on a bridge project in Nicaragua.

Nishant Srivastava

(M.S. EE '02, Ph.D. BME '07), Sunnyvale, Calif., is principal research and development engineer at Medical Devices in Mountain View.

Stefanel Barutcieff 🌐

(M.Des. '03), Bucharest, Romania, is creative director for Pilotfish.

Michael Lewis

(M.B.A. '03), Boulder, Colo., is editor-in-chief of *TransWorld Business* at TransWorld Media.

Jooyun Joh () (Ph.D. DSGN '03), Seoul, South Korea, is vice president of marketing for McDonald's of Korea.

Chunlun Lee () (M.Des. '06), Taipei City, Taiwan, is an industrial designer for ASUS in Singapore.

Jue Lu () (M.Des. '06), Taipei City, Taiwan, is manager of user experience at SapientNitro in Singapore.

Itsuro Shibata () (M.Des. '07), Tokyo, is on the faculty of Tohoku University of Art and Design.

Huaijun Yang 🌐 (M.S. MCOM '07), Shanghai,

China, is the director of Monogram Great China Division. He is helping to develop a Chinese practice to advise Chinese companies on how to build their brands in the United States market.

Sarah Lemp

(M.S. REHB '08), Hines, III., is a vocational rehabilitation counselor for the Veterans Health Administration.

Cherice Price

(M.S. REHB '08), Chicago, started her own financial services business and private vocational rehab firm. She is also co-founder of the Greater Englewood Community Development Corporation.

Ulrike Anders 🌐

(M.D.M. DSGN '09), Berlin, is co-founder of and design strategist for Nectar.

Casey Franklin

(ARCH '09), Overland Park, Kan., presented the paper "Energy Consumption Monitors: Building Occupant Behavior and Understanding" at the ARCC (Architectural Research Centers Consortium) 2013 Research Conference. The paper was written as part of his current research as a master's degree student in architecture at the University of Kansas.

Marie Garneau 🌐

(M.Des. '09), Paris, is a global creative director at DDB Worldwide.

Kichu Hong () (M.Des. '09, M.B.A. '10), Seoul, South Korea, is senior user-experience designer for IG Electronics.

Eui-Chul Jung 🌐

(Ph.D. DSGN '09), Seoul, South Korea, is an assistant professor in the College of Human Ecology at Yonsei University.

Seung Lim () (M. Des. (09), Seou

(M.Des. '09), Seoul, South Korea, is employed at Samsung SDS Co., Ltd.

Soo Paik () (M.Des. '09), Seoul, South Korea, is employed at Sams

Korea, is employed at Samsung SDS Co., Ltd.

Austin Champlin

(ME '10), Homewood, III., earned a master's degree from the University of Wisconsin-Madison.

Hiranya Pathak

(M.S. EE '10), Alpharetta, Ga., is a senior assistant engineer at Siemens.

Geoffrey Suvalko 🌐

(M.D.M. DSGN '10), Auckland, New Zealand, is co-founder of and principal at Thoughtfull.

Jonathan Achs

(ARCH '11), Grayslake, III., is an associate with Cornerstone Architects Ltd. in Itasca.

Rosika Babakhanian

(M.A.R. ARC3 '11), San Jose, Calif., is a project engineer with DPR Construction, based in Redwood City.

Bryan Fujiwara

(ARCH '12), Kaneohe, Hawaii, is an associate at RIM Architects in Honolulu.

Christian Gregory

(M.A.S. BIOL '12), Ingleside, III., is an environment, health, safety, and sustainability associate for Baxter Healthcare Corporation in Round Lake.

Christopher Kleehammer

(ARCH '12), Chicago, is a project manager at Door 13, an architectural design firm.

Theodore Pollari

(M.B.A., M.Des. '12), Elk Grove Village, III., is a design strategist for Humana, Inc.

SAVE THE DATE!

Don't miss the Global Alumni Gathering in Chicago from September 19-21, 2014, featuring distinguished alumni from throughout the world.



The program will be focused on many of the university's niche areas: innovation and entrepreneurship, energy, food safety, and capital markets.

Plan to be in Chicago to network and learn!

ALUMNI GATHERING

V ILLINOIS INSTITUTE OF TECHNOLOGY

September 19–21, 2014 Chicago



1. Homecoming Happiness Students enjoy carnival food and laughter at Homecoming 2013, held September 27–28. *Photo: Maria Heineman*

2. San Diego Gathering Alumni from the 1950s—including [left to right] Ed Flom (CHE '54), Melvin Friedlander (ME '50), Jim Siltanen (MET '50), and Martin Cooper (EE '50, M.S. '57)—recently reconnected in San Diego. Irwin Galter (EE '49) [far right] also joined the group. Photo: Nathan Petty Photography

3. IIT Trustees Dinner IIT President

John L. Anderson [left] and University Regent Craig Duchossois [right] present John Rowe, former chairman of the IIT Board of Trustees, with his University Regent medallion at the Board of Trustees dinner held on May 22. *Photo: Bonnie Robinson Photography*

4. Best Wishes, Ray and Jenny IIT President John Anderson and Institutional Advancement Vice President Betsy Hughes (as the Scarlet Hawk) joined several IIT alumni to celebrate the marriage of Ray Ballard (CHE '10) and Jenny Franck (next to the Scarlet Hawk). **5. An Evening at Ravinia** [Left to right] Jim Vancura (EE '75) and his wife, Cathy; Mike Candioto (MATH '74) and his wife, MaryJo; Frank Engelmann (EE '74) and his wife, Heidi; and Chuck Nodus (MET '73, M.B.A. '95) and his wife, Tammy, reunite at the IIT alumni event at Ravinia in Highland Park, III.

6. Congrats, Grads A group of students celebrate the Class of 2013 at a party in The Bog on May 16. *Photo: Bonnie Robinson Photography*

7. Golden Celebrants Members of the Class of 1963 celebrate the 50th anniversary of their graduation from IIT at the Golden Society Reunion, led by Board of Trustees member



Martin Jischke (PHYS '63) and a committee of 24 classmates. *Photo: Michael Goss Photography*

8. Boston Gathering Grace Colby (DSGN '85) [left] and Susan Solomon (CHEM '77), who both spoke at the September IIT alumni gathering in Boston, take a photo break with IIT President John Anderson. *Photo: Chip Fanelli Photography*

9. Cleversafe at UTP IIT President John Anderson congratulates Cleversafe founder and member of the IIT Board of Trustees Chris Gladwin during an alumni gathering for Cleversafe employees at University Technology Park. *Photo: Michael Goss Photography*

10. Good Times at the Arboretum Vincent Lucarelli (DSGN '69) and his family enjoy IIT Family

Day at Morton Arboretum in Lisle, III. More than 350 guests attended the annual spring event. Photo: Bonnie Robinson Photography

11. Iconic LEGOs Rocco Buttier (ARCH 1st year) displays his LEGO models of some of Chicago's most iconic structures during the annual IIT Build a LEGO City event. More than 1,300 alumni, families, and community members participated this year. *Photo: Michael Goss Photography*

12. New York City Gathering

Seven members of the IIT New York City alumni chapter leadership pose for a photo at the September campaign launch event: [top left to right] Hector Guillen (M.A.S. ARCH '91), secretary; Michael Siem (CHE '96), chair; Christopher Hayward (EE '87); [bottom left to right] Bikram Chandra (M.S. FM '06); Angela Nelson (LAW '01); Theresa Zappala (ARCH '10); and Mehdi Rizvi (ME '98). Not pictured: committee member Liz Byrnes (M.S. PSYC '81, Ph.D. '83) Photo: Char Smullyan Photography

ALUMNI Events

For information about the upcoming alumni events listed here and other alumni activities, please contact the Office of Alumni Relations at alumni@iit.edu or alumni.iit.edu or 312.567.5040.

HOUSTON ALUMNI GATHERING

Monday, November 11, 2013 Villa Rinata

Houston, Texas

IIT graduates are fueling innovations in space exploration. Join President John Anderson for an interactive discussion featuring four alumni currently working at NASA.

AUSTIN ALUMNI GATHERING

Tuesday, November 12, 2013 Whole Foods Market Headquarters Austin, Texas

Join fellow members of the IIT Alumni Association for an event at Whole Foods featuring a live cooking demonstration hosted by Rick Findlay (M.B.A. '87), vice president of purchasing and marketing.

CHICAGO ALUMNI GATHERING

Monday, November 18, 2013 1871 Chicago

Join IIT President John Anderson for an alumni event at 1871 featuring a program that showcases how IIT is educating its students to be innovative thinkers. A panel of IIT alumni entrepreneurs will share their knowledge and stories of their start-ups.

ARIZONA ALUMNI GATHERING

Wednesday, December 4, 2013 Scottsdale Museum of Contemporary Art Scottsdale, Ariz.

Join us for a reception and program featuring Provost Alan Cramb, who will talk about the university's exciting plans for a new Innovation Center.

TECH BATTLE 2013!

Sunday, December 15, 2013 California Lutheran University Thousand Oaks, Calif.

Join IIT President John Anderson and fellow members of the IIT Alumni Association on Cal Lutheran's campus for a pre-game brunch before the Illinois Tech Scarlet Hawks take on the Caltech Beavers.



SAVE THE DATE! ALUMNI AWARDS Friday, April 25, 2014 Hermann Hall

IIT Main Campus Chicago



SAVE THE DATE! MIES' BIRTHDAY CELEBRATION Thursday, March 27, 2014

S. R. Crown Hall IIT Main Campus Chicago

CHICAGO ALUMNI GATHERING

Tuesday, February 4, 2014 IIT Institute for Food Safety and Health Bedford Park, III.

Join Robert Brackett, vice president and director of IIT Institute for Food Safety and Health, for a reception and private tour.

SEATTLE ALUMNI GATHERING

Thursday, February 6, 2014 McCormick & Schmick's Seafood Restaurant Seattle

Join fellow members of the IIT Alumni Association at a cocktail reception and program featuring Lori Andrews, Distinguished Professor of Law and director of the Institute for Science, Law, and Technology at IIT Chicago-Kent College of Law.

DUPAGE AREA ENGINEERS WEEK ALUMNI BREAKFAST

Saturday, February 22, 2014 Daniel F. and Ada L. Rice Campus Wheaton, III.

Plan to attend a special alumni breakfast and early access to select exhibits at Daniel F. and Ada L. Rice Campus as part of the Annual DuPage Area Engineers Week Expo. Visit http://dupageeweek.iit.edu for more information about Engineers Week.

obituaries

Sam Farber

IIT Institute of Design Board of Overseers

Kitchens across America have within their ranks of cooking gadgets, from spatulas to salad spinners, the black-handled tools that compose the Good Grips line from OXO, the housewares manufacturer cofounded by Sam Farber; his wife, Betsey; and son John. The idea for a line of ergonomically designed utensils arose when Betsey Farber, who had mild arthritis in her hands, found a conventional potato peeler painful to use. Sam Farber, who founded the Copco enameled cast-iron cookware line in 1960, collaborated with the industrial-design company Smart Design to develop Good Grips. Farber sold OXO to the General Housekeeping Corporation in 1992. Farber served for many years on the Board of Overseers at IIT Institute of Design, where he established the Sam Farber Fellowship Award.

Farber is survived by his wife, Betsey; his sons, John and Thomas (from his first marriage to Joan Levine); two stepchildren; and other family members.

George Schipporeit

IIT College of Architecture Dean of Architecture (1980-89)

Co-designer of Chicago's Lake Point Tower-the world's tallest allresidential building until 1993-George Schipporeit had a long and venerable history with IIT College of Architecture, where he was a student from 1955-57. He studied under Alfred Caldwell and worked for Ludwig Mies van der Rohe from 1957-1960. Schipporeit served the college as a faculty member for 33 years; as director of the Department of Architecture from 1980-83; and as dean of the college from 1980-89 and interim dean from 1994-96. In the 2000s, Schipporeit established the International Center for Sustainable New Cities program. Additionally, he formed Schipporeit, Inc. and designed many notable high-rise buildings. Schipporeit was recognized with the American Institute of Architects (AIA) National Honor Award and the AIA Chicago Chapter 25-Year Award for Lake Point Tower.

At Schipporeit's memorial service, architect and friend Edward Windhorst (M.A.S. '93) spoke of Schipporeit's legacy: "As architect, educator, mentor and colleague, George gave us a host of professional offspring, working to principles he taught and lived by; an equal host touched by his humility, integrity, and steadfast support; an educational model for the study and sustainability of new and evolving cities worldwide; and an indisputable masterwork, Lake Point Tower, now a shining beacon for George that will endure into the furthest future."

Schipporeit is survived by his wife, Alice, two daughters, a stepson, a stepdaughter, and other family members.

[Editor's note: John Heinrich (ARCH '65) co-designed Lake Point Tower along with George Schipporeit.]

inmemoriam

Albert Rootberg CF '36 Chicago

Robert Schmidt

ME '36 La Grange Park, III.

Thomas Hunter FPE '40, M.S.

Westport, Conn. **John Shaver** EE '40 Aiken, S.C.

Arthur Franzen CHF '42

Santa Maria, Calif. Albert Halff M.S. CE '42

San Antonio, Texas **Earl Conrad** ME '43

Violet Czachorski ARSC '43 Indian Head Park,

Lucian Bielicki CHE '45

III.

Ridgefield, Conn. ME '45

Iowa City, Iowa

MF '45

Edward Gallett ME '47, M.S. EG '64

William Weathersby MF '47

Broomfield, Colo. John Donovan

CE '48, M.S. '58 Chicago

John Pottenger EE '48

Henry Pryor DSGN '48 Niles, III.

John Sachs Ph.D. '52 Wilton, Conn.

John Bosshart ME '49

Madan Ghai Ph.D. ME '49 Cincinnati

Fred Mocking FF '49 Skokie, III.

David Pasik FF '49

Erik Paulsen ME '49

Alexander Tseng IE '49, M.S. EE '50 Palo Alto, Calif.

Ronald Zegarski EE '64, M.S.'70 Crystal Lake, III.

> Kuemmerle ME '65 Fort Collins, Colo.

William Alexander

MATH '61

ME '61

Sarasota, Fla.

James Rollins

Robert Kleine

Torrington, Conn.

Charles Gifford EE '67 Dayton, Ohio

Richard Shearer M.S. DSGN '67 Homewood, III.

Krishna Pandey M.S. MF '69 Ranchi, Jharkhand

Norman Kornsand FPF '70 Walnut Creek, Calif.

Crown Point, Ind.

Rita Price M.S. MT '71 Cynthiana, Ky.

Wiley Moore M.P.A. '73 Chicago

Jane Barber DSGN '77 Chicago

Ned Rockwell M.A.S. CHE '86 Northfield, III.

Marjorie Reiter M.S. REHB '90 Hazel Crest, III.

Joseph Fernandez M.A.S. TE '01 Crest Hill, III.

Orlando, Fla.

Northridge, Calif.

Richard Baldwin CHF '50

Cape Elizabeth, Maine

CHEM '50

EE '50, M.S. '54 Bend, Ore.

Calif.

Whitehall, Mich.

Edward Goetsch

Jack Schmidt

Southlake, Texas

St. John, Ind.

Hellertown, Pa.

CHE '48, M.S. '50,

Lincolnshire, III.

Robert Scott M.S. CHEM '51 Rochester, N.Y. Seymour Weiss

IE '51 Urbana, III. **Andrew Brudnak** ME '52

Burr Ridge, III. **Clifford Nelsen**

MET '52 Key Largo, Fla. **Thomas Prosser**

CHEM '53 Shelby, N.C. **Paul Houlne**

CE '54 Dayton, Ohio

Arline Schoenrock HE '54 Palos Heights, III.

Leonard Schneller EE '55 Park Ridge, III.

George De Angelo ME '60 Sun City West, Ariz.

Joseph McBride CE '60

Crystal Lake, III. **Joseph Pryst** ME '60

John Sayre FPE '60 Louisville, Ky.

Chicago

Robert Cicero ARCH '63 Chicago

EE '63 Acton, Maine John Weaver IF '64

Monee, III. Albert Hawkes

Robert **Charles Smith**

Rancho Santa Fe,

John Stockham M.B.A. '70

rewind

Happy 10th Anniversary, MTCC!

Which we have a state of the IIT community with its overhead "L" tube and student-friendly layout. David Baker, IIT vice president for external affairs, says the design shows no sign of being past its prime.

"When I think about Rem Koolhaas's vision for MTCC—a college shopping mall for students, arranged along the paths that they take between class and dorm—I am amazed at how well this building has worked over the past decade," says Baker,

who listened to Koolhaas make his winning presentation 15 years earlier. He notes a recent observation made while at MTCC's Pritzker Club.

"I watched streams of students moving along the diagonal aluminum-plate walkway between MTCC and E1 Building, just as they did before the campus center was built, when they crossed the parking lots and passed under the noisy 'L' tracks, following their predictable shortest routes to their "When I think about Rem Koolhaas's vision for MTCC—a college shopping mall for students, arranged along the paths that they take between class and dorm—I am amazed at how well this building has worked over the past decade."

-David Baker, IIT Vice President for External Affairs

destinations," he says. "Now, students instead pass the One Stop, The Commons, organization tables along the Mies Bridge, and ping-pong and pool tables. MTCC's utilization is constantly evolving as students, along with faculty, staff, and outside groups, adapt its creative spaces to their needs."

The McCormick Tribune Campus Center is well equipped to provide its next decade of service to the IIT community.



Give the Gift of Time....Volunteer!



Make a difference in the lives of others by volunteering for IIT. Share your knowledge, experience, time, and talents with students and your alma mater.

There are many ways to get involved:

- Join the Alumni Admission Ambassador Program
- Provide career assistance to students
- Organize a reunion of your class, fraternity or sorority, or other group
- Get involved with your regional chapter or international group
- Become an IPRO judge
- Organize an alumni event in your area
- Speak at a university event or to a class
- And more! (Please let us know if you have any other ideas about how you can be involved.)

Contact the Office of Alumni Relations at 800.IIT.ALUM (800.448.2586) or alumni@iit.edu to discuss your interest in any or all of these opportunities.



ILLINOIS INSTITUTE OF TECHNOLOGY



10 West 35th Street, Suite 4D7-1 Chicago, IL 60616 Non-Profit Org. U.S. Postage PAID Illinois Institute of Technology

Fueling Innovation Globally



Indrani Medhi (DSGN '05) recognized a crucial issue in her home country of India: a whole segment of the population was missing out on information about jobs, finances, and more via the Internet because they could not read.

Medhi responded to this challenge by designing interfaces that allow users to easily interact with computers, expanding their opportunities.

Alumni like Medhi push the boundaries of what is possible, fueling innovation and change.

For nearly 125 years, IIT graduates have been transforming the world in which we live. *Fueling Innovation: The Campaign for IIT,* the university's six-year, \$250 million fundraising endeavor, will propel IIT into the top tier of the world's technology-focused, innovation-centered universities.

Visit **fuelinginnovation.iit.edu** for stories of innovators like Medhi and to learn more about the campaign.

Tell us your innovation story!

We want to know how you are affecting change in your communities, regions, and nations. Email us at innovation@iit.edu along with your name, class, and major.

fueling innovation