

FALL 2021

ILLINOIS TECH

Magazine



A President for All
Focused on Empowering Others,
Raj Echambadi Joins Illinois Tech
as New Leader

Design, Driver-Free

**Creating a Positive Impact
on the South Side**

A Modern Twist on a Retro Idea

Letter from the President



PHOTO: DAVID ETINGER

As my first semester as president winds down, I remain struck by the magnitude of what Illinois Institute of Technology represents. The accomplishments of our alumni are numerous and immeasurable, from the technological innovations of Armour College of Engineering graduates, to the impact that College of Architecture alumni have had on the skylines of Chicago and cities around the world, to Chicago-Kent College of Law counting among its alumni the first African-American woman admitted to the Illinois bar. This publication, *Illinois Tech Magazine*, has highlighted many stories of excellence exhibited by our alumni, and I am pleased to introduce this issue, which continues that tradition.

The opportunity to lead an institution whose founding mission was—and still is—to serve as an engine of opportunity resonated deeply with me. Higher education has changed my life; I have been afforded the opportunity to serve as the 10th president of Illinois Tech because of the affordable and accessible education I received, both in my home country of India and in the United States. It is my honor to guide this great university into a changing future, one upended by a once-in-a-lifetime pandemic and one that is well positioned to prepare the next generation of leaders for the grand challenges in the Fourth Industrial Revolution.

Our founding mission is as important today as ever before, and I believe that Illinois Tech's purpose—to provide unequalled opportunity, inclusive value, and affordability for diverse populations—is what the world needs to meet this historic moment in time.

As Illinois Tech's president, I promise to remain committed to listening and leading based on the collective wisdom of our community—and our alumni play a vital role in shaping that vision in a multitude of manners, not the least of which is the way in which they inspire us through their actions. In this issue you'll learn how some of them are doing that, including Dawveed Scully, who is working to make a transformative impact on the South Side of Chicago through the Michael Reese Hospital redevelopment; YJ Ahn, who is playing a leadership role in designing the future of (self) driving; Piyush Desai, whose outside-the-box thinking in building an electric motor could be a game-changing innovation in sustainability; and many others.

I look forward to working with all of you to develop new pathways and infinite possibilities for our students, faculty, and staff in order to bring greater representation to technology and to drive a more inclusive future.

Sincerely,
Raj Echambadi

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Illinois Institute of Technology, also known as Illinois Tech, is a private, technology-focused research university. Based in the global metropolis of Chicago, Illinois Tech is the only university of its kind in the city. It offers undergraduate and graduate degrees in engineering, science, architecture, business, design, human sciences, applied technology, and law.

One of 22 institutions that comprise the Association of Independent Technological Universities (AITU), Illinois Tech provides an exceptional education centered on active learning, and its graduates lead the state and much of the nation in economic prosperity. At Illinois Tech students are empowered to discover, create, and solve, and thus uniquely prepared to succeed in professions that require technological sophistication, an innovative mindset, and an entrepreneurial spirit.

Mission Statement

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

Armour College of Engineering Institute of Design
 Chicago-Kent College of Law Lewis College of Science
 College of Architecture and Letters
 College of Computing Stuart School of Business

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Features

8 COVER STORY
 Raj Echambadi has built his career by empowering and providing others with the opportunity to receive a quality education, an ethos that led him to his current role: Illinois Tech president.

12
 Raised on the South Side of Chicago, Dawveed Scully (ARCH '10) is prepared to make a transformative impact there through the Michael Reese Hospital redevelopment.

15
 YJ Ahn (M.D.M. '06) thrives on designing for the unknown, and her role leading the design team at Waymo, an autonomous driving company, fits the bill.

18
 While others dismissed the switched reluctance motor, Piyush Desai (M.S. EE '04, Ph.D. '09) saw an opportunity to create an electric motor that could revolutionize the industry.



20
 Turning a passion into his career, Ian Fleming (LAW '15) saw his hobby analyzing sports statistics manifest into a role running a professional women's soccer team.

Departments

- 2 Letters / On Campus
- 5 Research Briefs
- 7 Athletics
- 22 Philanthropy News
- 23 Alumni News
- 32 Rewind



Letters

Photographic Memories

Charles Ticho (EE '48) shared his memories of Illinois Tech during his time on campus from 1945–48 following his service in the United States Navy in World War II. Among the memories that Ticho shared was one involving Ludwig Mies van der Rohe, the longtime head of what is now the university's College of Architecture.

"During my last year at IIT [one of] the first of [Mies] van der Rohe's new campus buildings opened. Along with the grand opening ceremony, there was also a photographic exhibit of some of his most famous designs. The large photographs and design drawings were hanging in the halls of the building. Suddenly, while walking to class one day, I was dumbstruck. There, hanging on the wall, was a photograph of a house that I passed many times as young boy on Dolni Ulice, the street where our apartment house was located in Brno, Czechoslovakia. The street was on a steep incline, at the top of which it turned right and ran along the crest. This pioneering design of a private villa, the Tugendhat House in Brno, was one of the early designs of Mies van der Rohe and marked him for future greatness in the architecture field."

Fighting Against Aerosols—Then and Now

After reading the "Stopping the Spread" article in the spring 2021 edition of Illinois Tech Magazine, Paul Gregg (EE '59) reached out to share his memories of an event that he says took place at IIT Research Institute in the late 1960s involving a United States Army Chemical and Biological Warfare Command project in Fort Detrick, Maryland. The project included creating instrumentation for monitoring droplet-size distribution of an outdoor cloud of small liquid droplets, which are called aerosols.

"Our small group of engineers were able to adapt an existing oscilloscope-type instrument called a 'nuclear pulse height analyzer' to the need. This instrument is, as its name implies, used to analyze and display radioactive decay events in a bar graph-style of type [or energy] and rate of occurrence. We used an array of photomultiplier tubes as the data inputs to the instrument instead of radiation detectors. When an aerosol cloud exists in sunlight, each droplet reflects a 'twinkle,' or a small brief faint light flash undetectable to the human eye but easily sensed by the high sensitivity of a photomultiplier tube....The most important fact I learned is that with a clear liquid carrier most, if not all, bioagents are quickly killed by sunlight UV, lasting perhaps only five or 10 minutes in the infective state. To counter this effect, the offensive group uses a liquid with an opaque dye to shield the agent from UV as much as possible. At the time in 1968, it was just another 'military' project for us, and [we] never thought that we would be involved in a real 'biowar' with real infective aerosols much later in 2020–2021! There is one very important lesson from this of great use in the present COVID 'biowar': outdoors, sunlight UV will rapidly destroy aerosol-borne virus because there is no protective dye in a cough, sneeze, or voice exhalation aerosol....Indoors, the aerosols can linger for hours, as has been shown in videos of clouds taken, no doubt, with equipment similar to ours, but probably much improved with many decades of engineering technology since."

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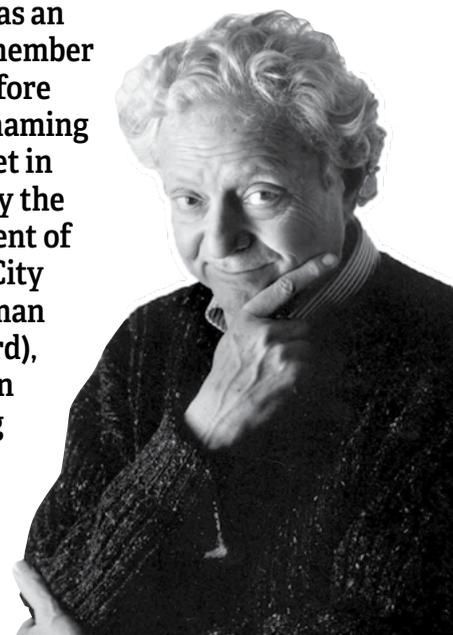


Refreshed, Cunningham Hall Reopens to Students

One year after the reopening of the fully renovated George J. Kacek Hall, another Modernist residence hall designed by Ludwig Mies van der Rohe is once again open for business. Cunningham Hall opened to students at the beginning of the fall 2021 semester, with a design mirroring that of the redesigned Kacek Hall. The building features six residential floors in a pod-style configuration, with student rooms pinwheeling around central study and social lounge areas, and another two floors that are in an apartment-style configuration.

A Sign of His Significance

On Saturday, September 18, the City of Chicago honored the late Leon Lederman, the Nobel Prize-winning physicist who served as an Illinois Tech faculty member for nearly 20 years before retiring in 2011, by renaming a portion of 33rd Street in his honor. Proposed by the university's Department of Physics, the Chicago City Council, led by Alderman Pat Dowell (Third Ward), passed an ordinance in October 2020 creating Leon Lederman Way.



Illinois Tech on the Scoville Scale

In its continuing quest to build more local partnerships, Chartwells, Illinois Tech’s food service provider, found a spicy solution this year: creating a university-branded hot sauce. One of its new partners in 2021 is Co-op Sauce, which teamed with the university to create Tech Yeah, a hot sauce made with honey and gochujang, a Korean red chili paste.



Marking History

A parking lot outside of Keating Sports Center, at the northern edge of Illinois Tech’s Mies Campus, sits at the intersection of 31st and State streets in Bronzeville, near the former site of Alpha Suffrage Club, the first organization established in Illinois to promote the right for Black women to vote. It was founded by Ida B. Wells.

There had been no indication that an organization of such importance once called that location home—until recently. On October 1, Illinois Tech unveiled a commemorative marker in honor of the Alpha Suffrage Club at that intersection. Illinois Tech President Raj Echambadi and Illinois State Representative Kambium “Kam” Buckner (26th District) were among the speakers at the event, along with two great grandchildren of Wells.

Newest Scarlet Hawks Take Flight

The new academic year kicked off in earnest in mid-August, when Illinois Tech welcomed a new cohort of first-year students to Mies Campus. Here’s a snapshot of the students who make up the newest class of Scarlet Hawks:

36

countries from around the world are represented

158

are the first in their family to attend college

33%

are women

Students come from

39 STATES



505

first-year students

32%

are from underrepresented groups

Illinois Tech Headliners



“That’s one of the things you need to verify, who are you actually talking to? Is it a legitimate organization? A number of organizations will have their numbers publicly online so you can say, ‘I will contact you back. Please give me your name, your ID number, and I will contact you back,’ just to make sure that it’s a legitimate organization. Organizations will be OK with that.”

Assistant Professor of Information Technology and Management **Maurice Dawson** on WBEZ’s *Reset* program during a discussion about how to outsmart phishers and scammers

“This could mean some real accountability for companies that aren’t taking care of their workers and are creating inequitable work environments where women and gender minorities are kept at the margins and abused.”

Associate Professor of Digital Humanities and Media Studies **Carly Kocurek** in the *New York Times* in the wake of employees walking out at video game maker Activision Blizzard after a lawsuit was filed by the State of California alleging workplace behavior issues



“We don’t know how long immunity lasts if you’re vaccinated, and we don’t know how long immunity lasts if you’ve been infected. Understanding reinfection is important as we get back to normal life.”

Professor of Food Science and Nutrition **Indika Edirisinghe** on WTTW discussing COVID-19 immunity, and the new nationwide study he’s participating in to better understand it



Seeds of Success

What started as a solution to an issue **Ashley-Marie (LAW 3rd Year)** and Gyasi Sutherland faced when they moved to the South Side of Chicago has turned into something much more—both in scope and in its potential to impact many others.

Once the couple settled into their new home, they realized there was little access to the fresh, healthy, culturally relevant food they desired. And while their fix was to grow their own organic produce, they recognized this was not an issue that they faced alone; through their own research, they would later learn that 40 percent of South Side residents have little to no access to fresh and nutritious foods.

Recognizing the opportunity to serve a need, the couple sprouted an idea: to start an urban farming business, which they call HEIRs Farm. After taking the top prize at Illinois Institute of Technology’s student-run business plan competition, Pitch@IllinoisTech, in June, they’re well on their way to advancing their business.

In addition to the \$30,000 prize that Ashley-Marie and Gyasi won through the Pitch competition, they have also received mentorship and other assistance through the Ed Kaplan Family Institute for Innovation and Tech Entrepreneurship’s startup accelerator.

HEIRs Farm is now focused on building its business to grow African diaspora produce with the intent to sell it to consumers via doorstep delivery and to wholesalers in the neighborhoods on the South Side. Starting with its original community garden, HEIRs Farm aims to grow its operation through a microgreens pilot and, ultimately, an aquaponic operation that it will build.

Social Media Shoutout

↻ Illinois Tech Retweeted

Senator Mattie Hunter @SenMattieHunter · Aug 8

Thank you to everyone that came and participated in our 17th annual health fair. All in all, we had about 80 vendors, and it was a blast!






Social Change and Illinois Tech

💬 1
↻ 6
❤️ 10
📤

Looped In

DURING A VISIT to Mies Campus in October, Illinois Governor J. B. Pritzker announced \$5 million in state funding for the university's campus microgrid, which will allow Illinois Tech to construct four new loops to its system, completing the university's original vision for the project.

Beyond its benefits for the university and its sustainability efforts, the microgrid offers Illinois Tech students a chance to play a role. Much of the design and development for the microgrid has been driven by Ph.D. students in the Department of Electrical and Computer Engineering.

"We have converted the campus to a living laboratory in the sense that right now we practice what we preach," says Bodine Chair Professor Mohammad Shahidehpour. "We go to teach our classes, and we tell students about these ideas. Now, we can demonstrate at all levels how this technology works."

With its completion on the horizon, here's a brief history of the Illinois Tech microgrid:

Early 2000s

Power demand on Illinois Institute of Technology's Mies Campus was reaching the limits of what its existing power substations could handle. Outages were occurring multiple times per year, causing hundreds of thousands of dollars in damage. Instead of repairing that system, the university aimed to build its own electricity infrastructure by developing a microgrid, an "islandable," looped system (where power moves both ways) that would provide more reliability as compared to a traditional radial system, where power moves in one direction.

2008

Supported by \$5 million that was originally planned for substation upgrades and an \$8 million grant from the U.S. Department of Energy, Bodine Chair Professor Mohammad Shahidehpour begins the development of one of the first microgrids in the nation.

2013

Work on the first phase of the microgrid finishes; three loops were completed, covering half of Mies Campus. Illinois Tech has saved \$10 million dollars by utilizing the microgrid, including an average of \$200,000 per year in energy savings.

2021

Shahidehpour was awarded \$5 million by the State of Illinois to install four new loops in Illinois Tech's microgrid over the next two years, completing the original vision for the microgrid and further increasing the system's reliability. —**Simon Morrow**



A model of the Illinois Tech microgrid in the Wanger Institute for Sustainable Energy Research is lit up in Michael Paul Galvin Tower

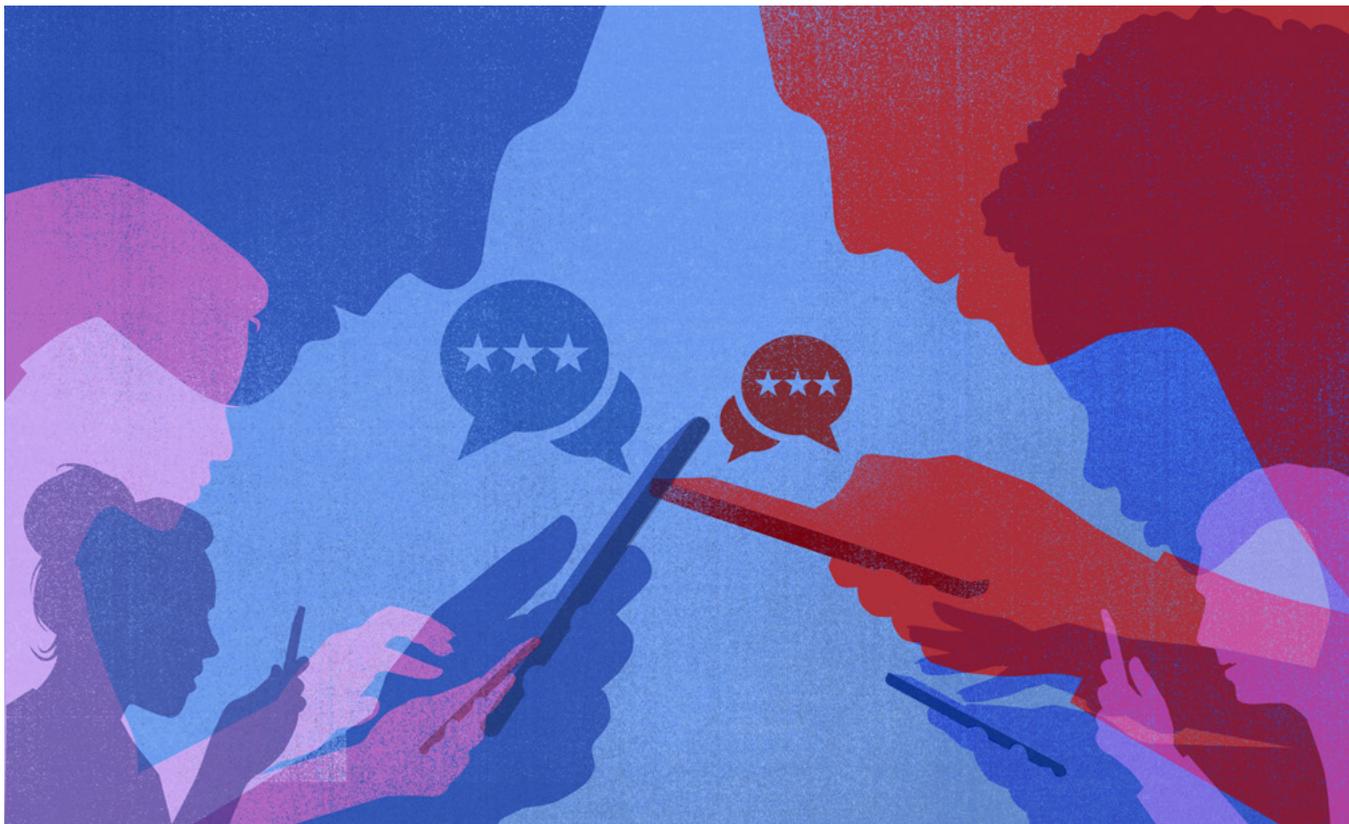


ILLUSTRATION: SCOTT BENBROOK

Bursting the (News) Bubble

EVER WONDER WHY Facebook recommends news stories that seem tailored to you? Researchers at Illinois Institute of Technology are studying how the algorithms that offer those recommendations can create filter bubbles, exposing readers to stories that skew toward their preconceived political views.

Learning how these algorithms work and how they affect readers is a crucial first step in understanding the consequences that can occur as people are drawn into these bubbles. Mustafa Bilgic, associate professor of computer science at Illinois Tech, and Matthew Shapiro, professor of political science, and their collaborators recently published a paper in *Proceedings of the Web Conference 2021* about their research titled “The Interaction Between Political Typology and Filter Bubbles in News Filter Algorithms.” The National Science Foundation provided funding support.

To conduct their study, the researchers gathered and curated a collection of more than 900,000 news articles and opinion essays from 41 sources annotated by topic and partisan lean. A simulation investigated how different algorithmic strategies affect filter bubble formation. Drawing on Pew Research Center studies of political typologies, heterogeneous effects based on the user’s pre-existing preferences were identified.

“If the algorithm shows you only the news that it

thinks you are going to like, to maximize its chances that you will click on it, you may not know that these other perspectives and these other news even exist,” says Bilgic, who served as the principal investigator on the project. “And because all of it is done behind the scenes, you probably wouldn’t notice that automated algorithms are filtering and selecting news for you.”

The algorithm used collaborative filtering, which makes recommendations based on the preferences of people with similar views, and content filtering, which makes recommendations based on the content in the articles. The types of filtering created by these algorithms were very different. Content-based filters rely on partisan language used in the articles to make recommendations. Collaborative filters make recommendations based on popular articles read by a group that best match a specific reader’s preferences.

The study shows that content-based recommendations are susceptible to biases based on distinctive partisan language used on a given topic, leading to over-recommendation of the most polarizing topics. Collaborative filtering recommenders, on the other hand, are susceptible to the majority opinion of users, leading to the most popular topics being recommended regardless of user preferences.

—Casey Moffitt and Linsey Maughan

Flying Start

FOR THE FIRST time in two years, Illinois Tech fall sports teams returned to action after not competing during the 2020 season due to the COVID-19 pandemic. Despite the layoff, multiple Scarlet Hawks teams started strong, opening with impressive starts that carried through their entire seasons.

Under the direction of first-year coach Kris Powell, a former University of Chicago assistant coach who replaced Erik Scanlan as the coach of both Illinois Tech tennis teams, the Scarlet Hawks women's tennis team finished its fall season with an 8–4 record, including a 7–2 run through the Northern Athletics Collegiate Conference, which was good for a third-place conference finish.



The tennis team wasn't the only Illinois Tech team to find success.

Despite a 1–4 start, the women's volleyball team finished the regular season with a 18–12 (8–5 NACC) record, including winning six straight matches and nine of 10 matches at one point during the season.

The women's soccer team started its season strong, winning nine of its first 14 matches. The Scarlet Hawks continued that success into the postseason, where they reached the NACC Championship game before falling 2–1 to Dominican. They finished the season 15–6–1 (11–3 NACC).

—Andrew Wyder



Hall of Hawks

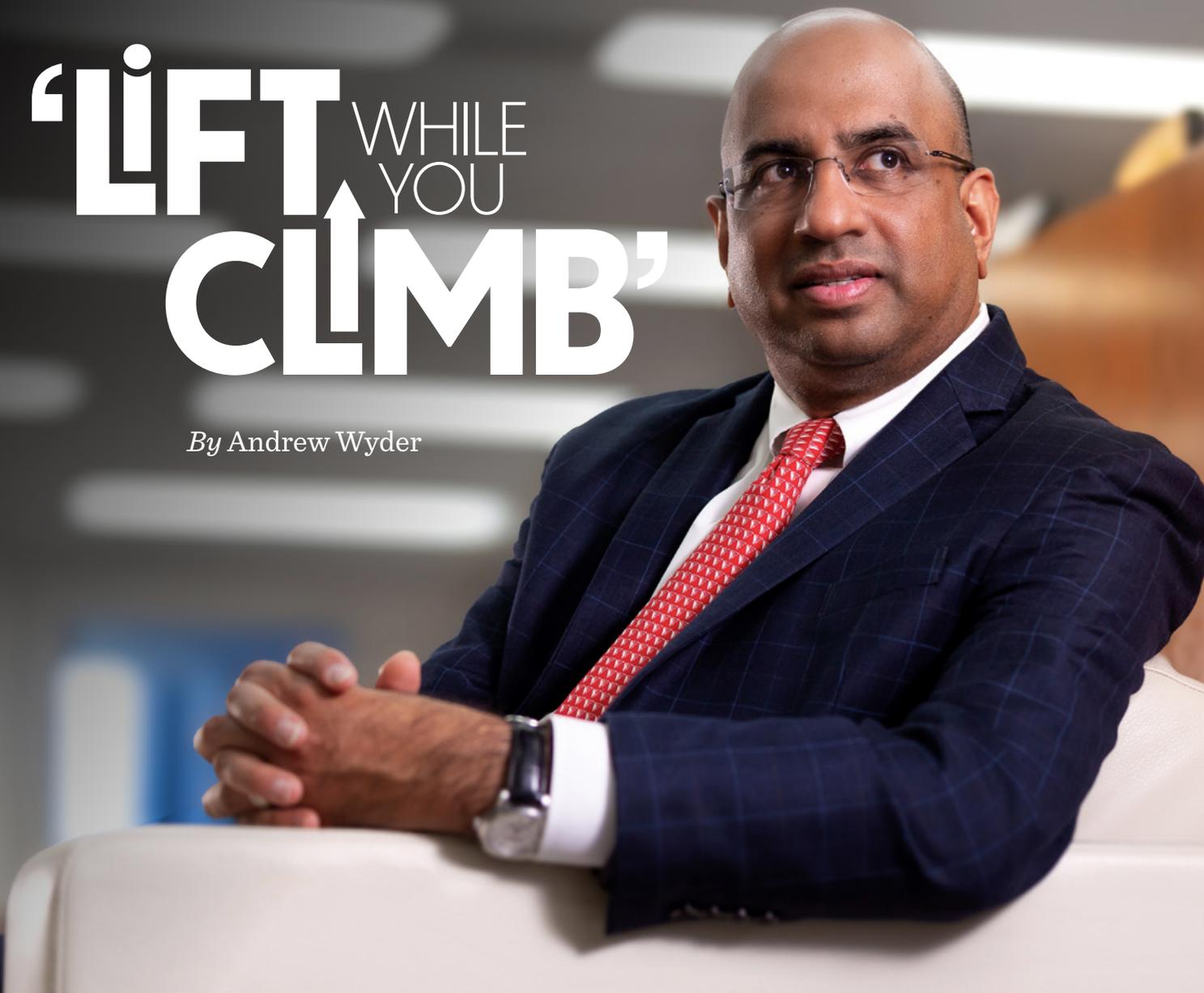
The Illinois Tech Athletic Advisory Board has announced the formation of the Athletics Hall of Fame, which has been approved by university leadership. The nomination process began earlier this fall, and will culminate with a ceremony in spring 2022.

Nominations can be submitted via a form accessible on the Illinois Tech Athletics website. The deadline to submit a nominee is January 1, 2022.

Inductees will fall under one of four categories: athlete, coach, team, or special inductee. Nominations will be reviewed by a selection committee made up of nine members appointed by the provost. —Andrew Wyder

'LIFT WHILE YOU CLIMB'

By Andrew Wyder



Sitting in a lounge chair in the corner of his 19th-floor office in Michael Paul Galvin Tower, Raj Echambadi, in the midst of answering a question, pauses and interrupts his own train of thought. Then, without missing a beat, he asks me to follow him into the conference room that connects to his office via a closed door no more than 10 or so feet away.

Inside the room, softly lit by the cloudy mid-October sky, Echambadi points to framed photos that hang on its walls.

"These are our students," the new Illinois Tech president says. "This is our community."

The pictures were hung shortly after his arrival on campus at the direction of Echambadi, who took office in mid-August. Each of the photos features Illinois Tech students—some posed for portraits, others working in a lab—from all races, genders, and nationalities. This

representation highlights Echambadi's ethos built on empowering and providing opportunities for everyone to receive a quality education. It's a worldview that helped Echambadi stand out among the candidates for the position.

"This is a daily reminder for all of us who make decisions in this room that it is not about us. It is fundamentally about these students from all different walks of life, as you can see," he says, alluding to the photos. "It is important for us to help them accomplish their potential so that they can become impactful leaders in their communities—however we define it—and consequently, through them, we accomplish our potential and our impact as well."

Echambadi, who served as the Dunton Family Dean at D'Amore-McKim School of Business at Northeastern University most recently, compares his role to that of a symphony conductor. In the analogy, he says he is

“The interesting thing about my experience in engineering school was I was exposed to people from all walks of life. It taught you humility, because you’re surrounded by brilliant people and you realize early on that collaboration is key to success.”

—Raj Echambadi

he says it helped open his eyes to a variety of perspectives and ideas.

That inquisitiveness further developed in college, where he chose to pursue engineering despite being accepted to both engineering and medical school in India, and ultimately earned a bachelor’s degree in mechanical engineering from Anna University. While the idea of conceptualizing and building things attracted him to engineering initially—he briefly worked for Massey Tractors and Castrol in his home country after earning his bachelor’s degree—Echambadi says he was drawn more to the deeper lessons that the discipline taught him and how those dovetailed with his other interests.

“The interesting thing about my experience in engineering school was I was exposed to people from all walks of life. It taught you humility, because you’re surrounded by brilliant people and you realize early on that collaboration is

providing the platform to help others find success.

That perspective was instilled early in Echambadi’s life. Growing up in Chennai, India, he remembers the impact of his father, Ragavan, and his voracious reading habit, one that touched on a variety of topics ranging from spirituality and history to cutting-edge issues in science. Echambadi, too, embraced the practice, and

key to success. It taught me to work with all types of people,” Echambadi says. “But the critical thing I remember was how, if you marry talent with passion, good things can happen.... While I was talented in engineering, I was more passionate about learning how organizations work. That’s why I decided to pursue a graduate degree in business.”

Echambadi went on to earn an M.B.A. from Anna University and, after coming to the United States, a Ph.D. in marketing from the University of Houston. From his time as a doctoral student and the more than a decade he spent working as a professor at the University of Central Florida through his time as a faculty member and administrator at the University of Illinois at Urbana-Champaign, Echambadi focused his

research on strategic innovation within organizations.

It was through his academic work that his philosophy as a leader began to crystalize, specifically in understanding the importance of empowering others and helping them, and the organizations they worked for, find success through their ideas.

Having been the beneficiary of an accessible and affordable education, Echambadi says pursuing a career in higher education was important to him—allowing him to give back to something that impacted him so profoundly. When he became an administrator, though, two of his mentors, longtime Illinois faculty member Paul Magelli Sr. and businessman Ed Hajim, further

Photos: David Ettinger



Illinois Tech President Raj Echambadi gives a thumbs up during a practice for his inauguration ceremony in Hermann Hall.

INAUGURATION UNITES COMMUNITY IN CELEBRATION OF ‘PERFECT STEWARD’

As the world, and higher education in particular, moves toward a future that is likely to provide both uncertainty about what lies ahead in the wake of a once-in-a-lifetime pandemic and the opportunity to advance new areas of progress, Illinois Institute of Technology celebrated the person that it believes will help usher the university into this new reality.

In front of university faculty, students, staff, and senior leadership, as well as local and national academic, civic, and business leaders, Raj Echambadi was inaugurated as the 10th president of Illinois Tech on September 17 in a ceremony at Hermann Hall.

Echambadi was hailed for his ability to not only lead, but also to ensure that all students are afforded the same opportunity to a quality education, an ethos that makes him the perfect match for a university founded on that same idea.

“His sterling track record for developing forward-thinking academic programs at some of the nation’s most prestigious and successful universities speaks for itself,” Board of Trustees Chairman Michael P. Galvin (LAW ’78) said of Echambadi. “But his deeply held belief in who we are as a community, and what we can achieve together as a university, makes him a perfect steward of our shared purpose and mission.”

Seven colleagues [six of whom spoke via a special video montage], which included keynote speaker James C. Bean, highlighted the impact that Echambadi made at Northeastern and the University of Illinois at Urbana-Champaign. Bean, who most recently served as provost and senior vice president of academic affairs at Northeastern, spoke of the changing terrain for higher education and how some universities, including Illinois Tech, are better prepared for the change that is coming. He also explained why Echambadi is the right person to lead it through this period.

“With his self-deprecating, droll sense of humor, exceptional listening skills, and commitment to diversity and innovation, Raj Echambadi is the ideal leader of this relevant, innovative, excellent, and diverse institution,” Bean said. “Together I expect to see even greater heights for Illinois Tech in the coming years.”

The student speakers echoed this familiar refrain.

“In my short time at Illinois Tech, I’ve found that we all strive to do better,” said Keru Omad (BME 2nd Year), one of the students to address the audience. “We innovate and create every single day, and when I look to our new president, I see the same passion to do better.”

Watch the entire ceremony online:

www.iit.edu/news/president-all-inauguration-raj-echambadi



Illinois Tech President Raj Echambadi speaks during his inauguration ceremony on September 17.

influenced his passion for higher education by instilling in him a powerful purpose: to live your values every day, to promote diversity, and to embrace the “moral obligation” that universities have to educate people from all walks of life and to make them feel like they belong.

One of his biggest achievements at Illinois highlights how those ideas started to manifest. He developed the iMBA, a scaled, unbundled, and stackable online degree program, which allowed students from around the world to access an education that was a fraction of the cost of a normal M.B.A. program and to pick and choose the courses that they needed.

“What was there from day one—and we were completely aligned on this—was that we wanted this program to be about access, that we wanted everybody to have an opportunity to get this M.B.A.,” says Deanna Raineri, vice president and senior vice chancellor for experiential digital global education at Northeastern, who worked with Echambadi on the development of the iMBA program at Illinois. “That’s actually the reason why we took this to Coursera, because we knew, if we were successful, we would achieve scale with Coursera, which meant that we could dramatically lower the cost.”

That work continued at Northeastern, where he helped create interdisciplinary M.B.A. programs; partnered with businesses, nonprofits, and other organizations to bring education programs to people in all walks and stations of life; and spearheaded diversity and inclusion efforts, including the

development of the Office of Student Engagement, Affinity, and Inclusion. The impact was felt beyond the classroom. A program that Echambadi helped develop with PwC sought to provide an opportunity for Black and Latinx students who had already earned bachelor's degrees to work with the firm while pursuing master's degrees in management at Northeastern, allowing those students both to start their careers and pursue an advanced degree and hours that counted toward professional licensure, like for a certified public accountant.

"One of the most unique aspects of Raj's vision is that if you're going to really be inclusive and expand educational opportunities, you have to also believe that the university is not the only place that people can learn, that learning can happen everywhere," says Kemi Jona, assistant vice chancellor for digital innovation and enterprise learning at Northeastern. "Rather than pushing back against that, he truly embraced that idea."

His colleagues say that such accomplishments as an educator and administrator speak for themselves, but it's Echambadi the person—his humility and his commitment to others—that make his move to Illinois Tech bittersweet: they're happy for him to receive this deserved opportunity, but sad they no longer get to work with him.

"There's not an elitist bone in his body. He welcomes students and colleagues from all walks of life," Jona says. "He is truly someone who embraces the power of education to change lives, and truly embodies the motto I really like: lift while you climb."

Adds Raineri, "I don't call him a colleague. I don't even really refer to him as a friend. I refer to him as my family. He's like a brother to me, I'm that close to him....Raj cares about people. His kindness, it's really exceptional." ●



Illinois Tech President Raj Echambadi poses for a photo after a ceremony dedicating a marker to honor the Alpha Suffrage Club on October 1 on Mies Campus.



Pillars of Strength

New Illinois Institute of Technology President Raj Echambadi aims to push the university forward by looking to its past and, specifically, its founding purpose—to liberate the collective power of difference to advance technology and progress for all—to serve as its guiding light.

Here are the four guiding pillars that Echambadi will adopt as the university's leader:

Opportunity Engine: As Chicago's only tech-focused university, Illinois Tech will build upon its historic strengths, embrace the opportunities arising from the interweaving of technologies into every facet of our lives, and seize this vital moment to advance technology as a force for good and an opportunity engine for all.

Reimagine Education: In an emerging world where digital platforms meld with physical locations to create new markets and new possibilities, Illinois Tech will build the hybrid capabilities to meet the needs of all students and learners with flexible offerings that produce the best return on investment in Illinois and among the best in the nation.

Empower Students: The university will create a curricula and culture that kindles curiosity and sparks the innovative spirit of its students to prepare them to be impactful leaders in their communities and empower them with the knowledge, competencies, and human-centered skills to solve the grand challenges of our times and to shape an equitable world.

Purpose-Driven Citizenship: Illinois Tech will work with the passion, commitment, and talent of our neighbors in Bronzeville and Chicago, as well as with our friends, donors, and alumni, to establish itself as a valued citizen in all of our communities through pursuing a philosophy to develop people to fulfill their potential.



Dawveed Scully (ARCH '10) stands near the now-vacant former site of the Michael Reese Hospital in Chicago's Bronzeville neighborhood.

Photo: David Ettinger

Equity *by* Design

By Linsey Maughan

Metra train tracks run at ground level through the Chicago South Side neighborhood of South Shore, where Dawveed Scully (ARCH '10) spent his early years. An urban designer and associate director at Skidmore, Owings & Merrill (SOM), and an adjunct instructor in architecture at Illinois Institute of Technology, the 36-year-old Scully recalls the boundary that the tracks created at 71st Street and Ridgeland Avenue, and within the realm of his childhood, a dividing line he opted not to cross.

“Urban spaces contribute to both physical and perceived boundaries,” Scully says. “There is a sense of barriers and thresholds and places that you don’t go due to infrastructure. Going to the other side of 71st Street is something that I barely remember doing. Those physical infrastructure barriers really sort of frame a territory, especially when you’re small and you have these big double-decker trains. I just remember being like, ‘I’m not going over there.’”

It would be some time before Scully understood how practices like redlining—a term that, generally, is defined as the discriminatory practice of denying services (typically financial) to residents of certain areas based on their race or ethnicity—shaped the planning and development of neighborhoods like South Shore.

“These barriers and spaces that I knew as normal, [I later] learned that they were designed conditions and policies,” he says. “[I came to understand] the role of design and planning in creating those places. A key thing that drives me as a designer is reimagining what these places could be by addressing historic inequities and barriers—imagining what a place can be if we amplified communities through design and made more just and equitable places.”

As a child, Scully had a natural curiosity with how things worked and learned to balance that with youthful creativity. He enjoyed drawing and storytelling, building with LEGOs, dismantling his Sega Genesis to understand how it was made, and playing basketball with other kids in a vacant lot next door to his house.

While he was a student at Morgan Park High School, Scully began taking drafting classes, which ignited his interest in architecture. By the time he graduated, he had won an internship with

Lohan Caprile Goettsch Architects (now Goettsch Partners) through the annual Newhouse Architecture and Design Competition run by the Chicago Architecture Center.

“That was really formative, being able to actually be [at Lohan],” Scully says. “They were doing the Soldier Field renovation at that time. It was just a really great environment to be a first step [in my career]. I got to participate and do drawings, and use AutoCAD and 3D modeling. It was a really great experience to get before going to school for [architecture].”

During college, Scully developed a strong interest in urban planning and urban design, and landed an internship at SOM, where over the next 13 years he ascended the ranks, first by being hired on full-time as a junior urban designer in April 2011.

In his 13 years at SOM, Scully has worked on projects in London, China, the Middle East, Europe, and South America, as well as in a number of cities in the United States, including Detroit; Atlanta; Nashville, Tennessee; Milwaukee; and Chicago and its surrounding suburbs.

“I definitely enjoy working on the South Side [of Chicago] because I grew up here,” Scully says, “but it’s equally as interesting to go to the West Side, to go to the suburbs, to go to other cities—places that have had these sort of historic inequities—and try to figure out ways to create plans and designs that impact public policy and bring community voices forward.”

In Chicago, one project in particular has evolved alongside Scully: the former Michael Reese Hospital site in Bronzeville. The hospital closed in 2009, and in the same year demolition of the buildings on the hospital’s campus began. Scully first worked on designs to repurpose the site as an intern with SOM, when the City of Chicago purchased the location as part of its bid to host the 2016 Olympics. (The site would have become the athletes’ village.)

When the city lost the bid, it went through various efforts to reimagine what the space could be, landing on plans to repurpose it into a mixed-use development known as Bronzeville Lakefront. Knowing that Michael Reese Hospital had once been a fixture in Bronzeville and a major source of jobs, Scully and his colleagues set their sights high.

“A lot of anchors on the South Side are gone and have not been recovered. How do we create something that becomes that anchor that allows folks to be able to work in their own community and not have to drive an hour or have to get downtown?”

—Dawveed Scully

“A lot of anchors on the South Side are gone and have not been recovered,” he says. “How do we create something that becomes that anchor that allows folks to be able to work in their own community and not have to drive an hour or have to get downtown?”

Scully is serving as lead designer for the Bronzeville Lakefront project, “setting the rules for what the design could be on rezoning, and putting that into the legal framework,” he says. A large portion of Scully’s role has also been to serve as a bridge between the client team and the community. The goal is to preserve the spirit and history of Bronzeville through the new development.

“A lot of buildings and old jazz clubs have been torn down,” he says. “We’re interested in bringing those stories to the forefront, bringing a tax base and jobs and catalyzing development in an ethical way—development that will allow folks to springboard. I think it could have a very positive impact in the neighborhood overall.”

Tiara Hughes is a close friend of Scully’s in addition to being his colleague at SOM, where she works as a senior urban designer and collaborates on many projects with Scully.

“Dawveed is selfless and a force,” says Hughes, who credits Scully with helping her land a job with the firm. “He makes moves and changes. I have a successful career as a black woman in SOM in urban design, and it’s thanks to him. He is a joy and a great mentor and friend.”

Today, Scully lives in the South Side neighborhood of Woodlawn. He has a number of career accolades under his belt, including being a Leadership Greater Chicago fellow since 2021, being recognized by *Crain’s Chicago Business* as one of 40 Under Forty in 2020, receiving the Urban Land Institute’s 2018 Young Visionary Award, serving on Chicago Mayor Lori Lightfoot’s mayoral transition team, and more.

His focus, as he looks to the future, is to continue to bring positive change to communities through better urban design.

“We have often underestimated the impact [of urban design] on people’s lives,” Scully says. “We all take expressways, but expressways used to be neighborhoods, and [I want to continue] thinking about those impacts on a city and continue to think about those big ideas.” ●



In this undated photo, Michael Reese Hospital is shown

Bronzeville Lakefront

This winter, developers will break ground on a massive redevelopment effort to turn the Michael Reese Hospital site into Bronzeville Lakefront, a 100-plus acre “mixed-use health innovation district” and “global hub for innovation and wellness,” according to the development’s website. Dawveed Scully is the lead designer on the project, and his firm, Skidmore, Owings & Merrill (SOM), is the lead master planner on the project as well as the architect of the 500,000-square-foot Chicago ARC Innovation Center, the first new building slated to be built on the site. The ARC Innovation Center will house retail space, a community center, and a new branch of Israel’s acclaimed Sheba Medical Center, known for its commitment to equitable access to health care. The Bronzeville practice will be Sheba’s first center located outside of Israel itself.

Scully and his colleagues talk about the project as having a “20-year horizon” due to its size, though he says it may move a little faster than that. SOM is supporting the infrastructure team to realize the master plan vision and reconnect the site to the community. Phase one, focused on the south end of the property, will cost \$600 million and is scheduled to be complete by 2026, including completion of the ARC Innovation Center. A mixed-income senior housing building and a new park are also part of phase one, as is the reuse of Singer Pavilion, the only building from Michael Reese Hospital that will be preserved.



Driving Into the Future of the Unknown

By Steve Hendershot

Photo: Courtesy of Waymo



YJ Ahn (M.D.M. '06) sits in the Google Firefly, the first autonomous vehicle that she helped design.

YJ Ahn (M.D.M. '06) seems too warm and approachable to be an agent of radical change. Yet those are the traits that she shares with her signature project, the Waymo Driver: a combination of both hardware and software that, when applied, looks like a sailboat wearing a fedora, but that aspires to make your car drive itself.

Ahn didn't set out to design autonomous vehicles, or to work at Waymo, which spun out from Google in 2016 and, like Google, is a subsidiary of parent company Alphabet. But she did plan to devote her career to tackling complex challenges with society-altering implications, and the futuristic world of autonomous vehicles certainly qualifies.

"I enjoy [projects] with lots of technology and complexity, and making new things—that's what gets me," Ahn says. "I've always enjoyed the chaos [of pursuing an undefined solution]."

"That's actually the most exciting time for me. When you're able to create something new for people to experience, it's so satisfying."

Ahn's career has included three such industry-shaking challenges. In 2001, after completing her first master's degree in industrial design in her native South Korea, she took a job at LG Electronics, where she

worked on digital electronics such as home-theater products in the midst of the high-definition revolution. Then, after five years there, she moved to Chicago to pursue a second graduate degree at Illinois Tech's Institute of Design. She stayed in the area to take a job at Motorola, a flip-phone behemoth that was racing to adapt to the smartphone era.

"YJ was always more than a designer. She was not only good at solving problems, but also at understanding and defining the problems that needed to be solved, even on projects that were complex and ambiguous," says Peter Pfanner, Ahn's supervisor at Motorola. "She's a prototype for what designers need to be in the future, and for what design needs to be able to do."

Ahn stayed at Motorola for six years, working to develop Motorola's first Android devices. She left just as the category was maturing—and learned something about herself in the process.

"When everything is settled, and the focus becomes 'Let's make it faster, thinner, smaller,' that's when I start losing interest a little bit," she says.

In that sense, Ahn has now found the perfect industry: she has been working on autonomous vehicle technology for nine years, but the finish line remains miles ahead. Waymo, where Ahn is head of design, leads the small pack of companies competing to define

a future where transportation is shaped by autonomous vehicles. The company began as a project within Google in 2009; Ahn joined in 2012, flying to Silicon Valley for an interview without knowing the project for which she was being recruited.

Once she learned the details, there wasn't much to negotiate.

"I realized the challenge was to change the future of transportation, and I saw another chance to work on one of these major transitions. I didn't have to think twice," Ahn says.

Among her first tasks was to lead the design of the Google Firefly, a self-driving car built in 2014.

The Firefly wasn't ready for primetime—nor was it intended to be—but as a functional autonomous vehicle prototype, it represented a milestone for the industry. It also paved the way for broader consumer acceptance of the concept of an autonomous vehicle.

"I realized the challenge was to change the future of transportation, and I saw another chance to work on one of these major transitions. I didn't have to think twice." —YJ Ahn

"The first design was exceptionally friendly, because we didn't want people thinking, 'Oh my God, there's a robot car invading my neighborhood,'" Ahn says. "Just looking at it was scary, because it was a car with no one inside, yet it was moving around. So we wanted to take baby steps." Gradually the spec for Waymo's autonomous vehicles has come into focus. When Ahn first surveyed her design team for ideas during the Firefly's development, they returned images whose inspirations ranged from spaceships to toy cars. Prospective passengers asked about what they wanted in an autonomous car listed features such as spas, movie theaters, and roundtable seating. But as Waymo's prototype testing expanded, the team soon learned that the form factor of a traditional car seemed to work just fine. So Waymo changed strategies and created the Waymo Driver, technology capable of turning standard production cars into autonomous-driving marvels, rather than building standalone autonomous vehicles. That strategy has helped Waymo push closer to commercialization: Waymo Driver now operates a fully public driverless ride-hailing service in Phoenix, and is also testing its technology in numerous other markets and conditions. The company in August announced its Trusted Tester program for select members of the public to experience the service in San Francisco.

Of course, as Waymo makes strides, there's also the danger that Ahn will get bored and move on to another industry primed for upheaval. Are autonomous vehicles at risk of becoming stable and boring?

"At some point people will find the sweet spot and this industry will become settled. But we're still at a place where this technology has just started, and we still have to go through many stages of adoption, adaptation, and evolution," Ahn says.

To some people, that's a wearying thought. But for Ahn, who is happiest in the midst of the chaos of change, it's the best-case scenario. ●

Designing for What's Next

YJ Ahn (M.D.M. '06) has devoted her career to tackling complex challenges with society-altering implications. Wading into the waters of autonomous vehicles certainly qualifies.

Throughout nearly a decade at Waymo, the autonomous vehicle maker that spun out of Google, Ahn has developed a key insight into her emerging industry: people don't know what they don't know.

"It is risky to apply typical market research methods for something that doesn't exist yet. It's good for improving existing products because then you already have a car and you have pain points that [research] can help you identify and improve," Ahn says. But when it's something wholly new, "A lot of times people have no idea what the technology can lead them to."

Her team's current project, the Waymo Driver, is a good example of this process.

It uses data collected from tests to further refine the Waymo Driver. For example, when it became clear that human drivers struggled with the inability to interact with a Waymo-powered vehicle—to signal an intent to yield, for instance—the Waymo team built an LED display atop the vehicle's rooftop apparatus to provide nearby drivers with information about its plans. That sort of change, which improves the perceived safety of autonomous vehicles, may be nearly as essential to the future of autonomous vehicles as their actual performance.

MORE ONLINE

Waymo Driver: waymo.com/waymo-driver

BUILDING THE MOTOR AHEAD OF ITS TIME

By Simon Morrow

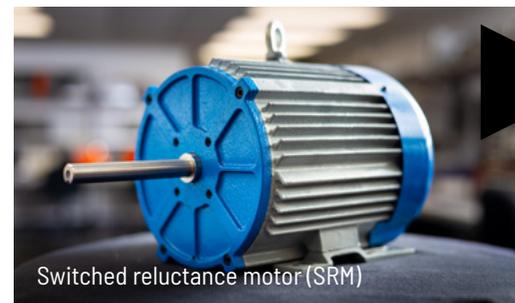
Piyush Desai is pictured in Illinois Tech Professor Mahesh Krishnamurthy's lab with the switch reluctance motor he designed.

From their home in Bagasara, India, Piyush Desai (M.S. EE '04, Ph.D. '09) grew up helping his father fix household items, ranging from motors to gramophones to old radios that operated using valves and tubes.

"My dad had a dream of being an engineer, but he had to drop out of school to work in my grandfather's shop and wasn't able to achieve that dream. By working with him, engineering became my choice unconsciously," says Desai.

Having been raised to view natural resources as sacred, Desai realized the immense energy-saving potential by modernizing motors and drives.

"Motors are both the entrance and exit of the energy food chain," says Desai. "Almost 95 percent of electricity is generated by an electric motor, and almost 50 percent of that electricity is consumed by an electric motor."



Photos: David Ettinger

He carried this fundamental belief with him in his first semester as a master's student at Illinois Institute of Technology in 2002. Having left both a decade-long career and his wife and young daughter in India, Desai was focused entirely on reaching a level of success in the program to make the sacrifices worth it. He immediately began searching for a research project that would offer a real-world impact. But he didn't confine himself to the most popular motors of the time.

"I believe not just in invention, but in retro-invention," says Desai. "I firmly believe that we can always find ideas that were ahead of their time."

He came across the switched reluctance motor (SRM), a nearly 200-year-old design whose reliance on then-futuristic electronic sensors and computing power had caused others to dismiss it for decades.

But in the early 2000s, with computing power becoming more powerful, affordable, and accessible every year, Desai believed that the SRM's time had come.

At that time, compared to induction motors that had been the focus of decades of research and development, SRMs were inefficient, noisy, and weak. The maturity of the technology had a long way to go, but Desai saw the benefits of SRMs.

"[The SRM] is inherently cost-effective, it's highly reliable, and it's fault-tolerant. With other motors, if something goes wrong the motor shuts down. With SRMs, you can limp home with reduced performance and discomfort, but at least if it was in your car, you can drive it slowly and go home or get to the nearest repair shop," says Desai.

This fault-tolerance had kept SRMs in use in a few applications where reliability was mission-critical, such as nuclear power plants. Desai felt that even if he only solved one of the SRM's problems, that would be enough to give them the edge over other motors in some markets.

He began learning everything he could about SRMs.

Longstanding SRM designs used four rotor poles, protrusions from the central rotating shaft that make the motor spin by rotating to align with a surrounding magnetic field. It was conventionally believed that increasing the number of rotor poles would decrease performance.

Desai was convinced this was wrong and set out to prove it.

**"I believe not just in invention,
but in retro-invention.
I firmly believe that we can
always find ideas that were
ahead of their time."**

—Piyush Desai

He became a fixture in the motors laboratory in the basement of Siegel Hall, showing up early most mornings and working until after dark. He chipped away at the problem, prototyping and testing motor components and learning sophisticated numerical modeling, which allows for virtual prototyping, a tool he still considers central to his success.

"I really want to break my head on simulations. I put the majority of my efforts into perfecting the art of simulating to a point where simulation is not a rough approximation, but it's a pretty darn bullseye," he says.

Within two years, Desai was filing for a patent for a high rotor pole SRM. Not only had he managed to make it run, but he had also increased the motor's efficiency and power.

"Technologists can become stagnant," says Nigel Schofield, a professor at the University of Huddersfield in the United Kingdom who collaborated with Desai during this time. "People just copy and iterate and tweak, and then suddenly, somebody like Piyush will come along and say, 'I want to do it totally different.'" It started people thinking about doing things differently, which opened up the field and spurred a lot of other ideas."

By 2013 he was focused on building his own consulting firm. Then his patent caught the attention of Silicon Valley entrepreneurs who reached out to see if Desai would be interested in building a startup together centered on SRMs.

Desai knew this was his big break.

They co-founded a company, now called Turntide Technologies, that considers SRMs as revolutionary to the motor market as LEDs were to lightbulbs.

While other electric motors tend to only have high efficiency under narrow running conditions, Turntide has achieved high efficiency across the board in SRMs. In 2019 the National Renewable Energy Laboratory found up to 71 percent energy savings in HVAC systems that were switched to Turntide SRMs.

As it turns its sights on the exploding electric vehicle market, Turntide's motors have attracted investors such as Amazon, BMW, and Bill Gates. In 2021 the company received \$225 million in financing, bringing its total funding to \$400 million.

Turntide has installed more than 5,000 SRMs and grown to more than 500 employees. Desai's mission is to reduce the energy consumption of electric motors worldwide by replacing them with SRMs.

"It's fortunate to be in a position where you can live your values entirely. I'm not selling sugary candy while prohibiting my kids from eating it," says Desai. "I can live just one life." ●

MORE ONLINE

Turntide Technologies: turntide.com

Inquiring Mind

By Tad Vezner



Photo: Justin Green

There was a time when Ian Fleming (LAW '15), just for fun, typed up contracts for his favorite baseball icons—this many dollars for that many years. He'd pick a team and peg every player.

He was eight years old.

"Even from a very, very young age, I wanted to be a general manager as much as I wanted to be a professional athlete. Which is weird," Fleming laughs.

But those exercises on his old Windows 98 computer system led to ambitions.

Fleming eventually got a law degree, taught himself to code at night, and turned his wonky side hobby into a general manager position in the largest professional women's soccer league in the United States.

"If you're doing the things you need to do, you will win more often than you lose," Fleming says. "And I'd much rather my stress be related to something I enjoy."

It took Fleming some time to find his way.

Born in the small town of Warwick, New York, Fleming was a good enough soccer player to earn a scholarship to play at Limestone University in South Carolina—until a herniated disk put a stop to his career. He went on to receive a B.S. in economics and to work for an investment firm before pursuing a law degree at Chicago-Kent College of Law.

Fleming started his career at a financial law firm in Chicago, doing project work. He soon got into business analysis, which at least tapped his penchant for equations.

But it wasn't enough.

As soon as he came home, Fleming kept his attention focused on statistics: not those of businesses, but of sports teams.

"It was every night until bedtime," says his wife, Hélène Balcerac. "But he had no choice. [Sports analysis] was what he wanted to do."

Fleming started analyzing hockey players, specifically goaltenders. There was a common perception about goaltending in the industry, specifically that, in some ways, it defied reason—the position is incredibly difficult to understand, much less apply any semblance of logic to.

But there was a glut of analysis about other positions—so he chose to try and define the illogical.

"You look at basic stats that have existed for decades. Save percentage, that's the gold standard," Fleming explains, referring to the percentage of shots that a goaltender denies. "But the thing that was being missed is that not all shots are created equal."

He took that save data and broke it down by player. Then he broke it down even more: how many of those saves were "high danger" saves, based on where the shot was taken from? What about quality of teammates and quality of opposition?

He'd then predict the number of goals against each player for every 48 minutes—the average amount of time they spent at the net when the opposing teams were at equal strength—and compared it to the league average. Fleming charted his stats and explained them. He built a

data visualizations that would later comprise his portfolio. His analysis started to gain traction. His Twitter following grew from 20 to 2,600. Soon enough, hockey coaches reached out to talk about their goalies.

Fleming's wife bet him that within three years he'd be a general manager.

"The odds of that happening are so slim," he told her.

The San Jose Earthquakes, a Major League Soccer team, was the first sports team to hire Fleming. As senior manager of business intelligence and analytics, he analyzed the maneuvers of fans, not players. Instead of on-the-field stats, he tracked ticket sales, season ticket renewals, parking flow.

In 2019 Frank Arnold, vice president of administration for the Houston Dynamo and Houston Dash professional soccer teams, hired him away from San Jose.

"He brought a level of sophistication that we hadn't had previously: an understanding of statistics and predictive modeling," Arnold says.

When Fleming told Arnold about his passion for analyzing athletics, rather than stadium flow, Arnold listened. He introduced Fleming to the Dash's head coach.

"We struck up a relationship," Fleming says of the coach. "At times, he'd shoot an email, 'I've got this trade offer, you have any thoughts?'"

"My process has changed dramatically from the time I did that website," Fleming adds. Instead of using league-aggregated data, he now aggregates raw data from the soccer field—passes, completions, distances the ball traveled, performance when players are up or down a goal—to build models to isolate the effectiveness of each player.

In 2020 the Dash won the National Women's Soccer League's Challenge Cup, the first trophy the team had ever won as an organization. While Fleming says the win was "certainly not something I'd take any glory for," it didn't hurt his prospects when he made the short list for the general manager opening with the Orlando Pride, another NWSL team. He started as the Pride's general manager in December 2020.

The Pride finished dead last in the league in 2019; 2020 was lost to COVID-19. Under Fleming in 2021, the team had the best start in its history: a seven-game undefeated streak of four wins and three draws. After that, some of his players left to compete in the Olympics, and the team faltered some, ultimately finishing 7-10-7 and five points shy of a playoff berth.

Despite the ups and downs, Fleming is confident that his penchant for predictive analysis gives him an edge.

"We don't have a lot of data scientists in the league. But having a data scientist as a GM, you have someone who can scout and measure opposition in ways no one else does," he says. "I'm building a team just like I wanted to do when I was little." ●

MORE ONLINE

Orlando Pride: orlandocitysc.com/pride

Remembered in Stone (and Glass)

The culture of philanthropy at Illinois Institute of Technology is as old as Illinois Tech itself. This year, as in years past, the philanthropy of alumni, trustees, and friends has made lasting contributions to the success of our university and our students, empowering them to make the difference they were born to make.



University Regent Ralph Wanger at the unveiling of the University Regents Tribute Wall in The McCormick Tribune Campus Center.

Kacek Hall

George J. Kacek (EE '54, M.S. '55) was a hard worker, modest, and earnest in his academic pursuits, with curiosity that burst at the seams. A successful engineer and savvy investor, Kacek made an estate gift that established the George J. Kacek Scholarship fund, and supported the renovation and restoration of George J. Kacek Hall.

George Kacek—along with his niece, Illinois Tech Trustee Stacey Kacek, who has echoed her uncle's commitment to Illinois Tech by stewarding his bequest—understood the power of Illinois Tech's vision to be a university that provides students with a genuinely first-class professional and technical education, regardless of their means or where they come from. Thanks to the Kaceks, students will receive the support they need and a place to call home.

Honoring Our University Regents

Whether they know it or not, every Illinois Tech student has felt the impact of the support of Illinois

Tech's University Regents. A regent is a trustee who has distinguished themselves as a change agent for Illinois Tech. Through support for research, scholarships, residence halls, institutes, endowed chairs, and professorships, as well as through their expertise, vision, and leadership, University Regents form the backbone of Illinois Tech's philanthropic community.

Combined, University Regents have committed decades of service to Illinois Tech's Board of Trustees and hundreds of millions of dollars in support of Illinois Tech's vision and strategic goals. This fall Illinois Tech was proud to unveil the University Regents Tribute Wall in The McCormick Tribune Campus Center, a permanent tribute to the remarkable commitment and generosity of Craig J. Duchossois, Robert W. Galvin, Robert A. Pritzker (IE '46), John W. Rowe, M. A. Self, Ralph Wanger, and Alan W. "Bud" Wendorf (ME '71).

Michael Paul Galvin Tower

As 2021 draws to a close, Illinois Tech is poised to make

unprecedented advancements in support for our students. This is in no small part thanks to the vision and leadership of Michael P. Galvin (LAW '78), chair of Illinois Tech's Board of Trustees and the namesake of Michael Paul Galvin Tower, which was rededicated on October 28, 2021, in honor of his distinguished record of service to Illinois Tech.

Lauded for his relentless drive toward continuous tech innovation, his operations acumen, and unflinching commitment to ethics, Galvin is one of the most prolific philanthropists in Illinois Tech history. In addition to his ongoing support for countless strategic priorities throughout the university, he has given extensively to scholarships across the university, including the Michael Paul Galvin Endowed Scholarship and the Elizabeth and Michael Galvin Endowed Scholarship. He helped to establish the Robert W. Galvin Center for Electricity Innovation, and recently established the Michael Paul Galvin Chair in Entrepreneurship and Applied Legal Technology.

He is also the son of the late Robert W. Galvin, an icon in innovation and former chair and CEO of Motorola, Inc., University Regent, and the chair of Illinois Tech's Board of Trustees from 1979 to 1990.

As an alumnus, Galvin also knows firsthand the power of an Illinois Tech education to make a decisive difference in the lives of students. Illinois Tech's culture of philanthropy is invigorated and breaking fundraising records in part because of Galvin's commitment to Illinois Tech's vision of fueling Chicago's tech rise.

—Joe Giovannetti

Visit iit.edu/give to join us in making a difference.

Class Notes

1950s

Theodore Brown

(CHEM '50), North Branford, Conn., received the Alumni Medal at the 2021 Alumni Awards Ceremony on September 18, 2021.

James Albrecht

(FE '53, M.S. '55), Baltimore, received the Alumni Service Award at the 2021 Alumni Awards Ceremony on September 18, 2021.

1960s

Stephen McCluskey

(PHYS '61), Morgantown, W.Va., was appointed as a fellow of the American Astronomical Society for his historical research in early astronomies and his service to the society's Working Group on the Preservation of Astronomical Heritage.

David Rogers

(M.S. EE '64), Fargo, N.D., retired in June 2020 from North Dakota State University after 40 years of service and was given the title of emeritus professor.

Warren Letzsch

(CHE '67), Ellicott City, Md., was made a fellow of the American Institute of Chemical Engineers.

Dawn Schulz

(LAW '68), McLean, Va., was honored at the annual Florida Bar convention for 50-plus years of dedication to the practice of law.

Thomas Morel

(M.S. MAE '69, Ph.D. '72), Hinsdale, Ill., was elected as chairman of Gamma Technologies.

Allen Ottens

(German '69), Rockford, Ill., has published a book, *General John A. Rawlins: No Ordinary Man*, about a general who served in the Civil War and was the Secretary of War under President Ulysses S. Grant.

1970s

Kumbakonam Rajagopal

(M.S. MAE '74), College Station, Texas, received the Professional Achievement Award at the 2021 Alumni Awards Ceremony on September 18, 2021.

Jim Berke

(EE '79), Georgetown, Texas, retired in January 2021 from GE Aviation.

Joey Perry

(CS '79), Pflugerville, Texas, recently published his second book, titled *Pressing on Toward Maturity: Seven Biblical Truths for Spiritual Growth*.



Mies van der Rohe Society Director Cynthia Vranas Olsen (M.ARCH '01, Ph.D. '17) guides alumni on a walking tour of Mies Campus.

Molly Ryan

(LAW '79), River Forest, Ill., was recognized by *Crain's Chicago Business* as one of the 2021 Notable General Counsels.

1980s

Amy Campanelli

(LAW '81), La Grange, Ill., joined Lawndale Christian Legal Center as vice president of restorative justice.

Perri Irmey

(ARCH '81), Chicago, received the honor of Chevalier, the order of Arts and Letters, from the government of France.

James McMahon

(MET '81), Winchester, Calif., received the John J. Schommer Honor I Award at the 2021 Alumni Awards Ceremony on September 18, 2021.

Mathai Varghese

(MATH '81), North Terrace, Adelaide, Australia, was awarded the prestigious 2021 Hannan Medal, which is a career achievement award in pure mathematics, by the Australian Academy of Science.

Mary Kisinger

(M.B.A. MKT '89), Fitzwilliam, N.H., is nearing retirement while enjoying

gardening, rehabbing an 1810 house, and working part-time as deputy tax collector for a small, quintessential New England town.

1990s

Jongsub Moon

(Ph.D. CS '91), South Korea, received an International Award of Merit at the 2021 Alumni Awards Ceremony on September 18, 2021.

Vasudevan Rajaram

(LAW '91), Oakbrook, Ill., is now retired and enjoys interactions with the Ed Kaplan Family Institute for Innovation and Tech Entrepreneurship and the International Alumni Committee.

Catherine Tojaga

(ME '91), Itasca, Ill., was recognized by *Crain's Chicago Business* as a 2020 Notable Women in Construction and Design.

Ramiro Atristain

(M.S. FIN '93), Chicago, received an International Award of Merit at the 2021 Alumni Awards Ceremony on September 18, 2021.

Mark Nields

(LAW '94), Chicago, was honored in the September 2021 issue of *Naples Illustrated* as a top lawyer for intellectual property law.



Illinois Tech Board of Trustees Chairman Michael P. Galvin (LAW '78) welcomes alumni, family, and friends to the 2021 Alumni Awards and 50th reunion luncheon.



Illinois Tech President Raj Echambadi has a conversation with members of the African American Alumni Association during Homecoming and Reunion Weekend 2021.

Xavier Pillai
(LAW '94), Schaumburg, Ill., was elected as a fellow of American Chemical Society.

Nancy Ardell
(LAW '96), Tampa, Fla., joined Florida Cancer Specialists & Research Institute as chief legal officer.

Allan Sanedrin
(EE '96), Hoffman Estates, Ill., started a new position as a principal engineer—fire and life safety signaling systems.

Stephen Crossman
(LAW '97), Parker, Colo., was promoted to chief revenue officer with SurePoint Technologies.

Robert Surrette
(LAW '97), Downers Grove, Ill., received a Professional Achievement Award at the 2021 Alumni Awards Ceremony on September 18, 2021.

Bryan Field
(PHYS '98), Yonkers, N.Y., was commissioned by MIT Press to write a book for its Essential Knowledge series. The book will be called *A Theory of Everything*, and is expected to be published in spring 2023.

Pranav Shah
(LAW '99), Middleton, Wis., was elected to the Board of Directors for the Association of Corporate Counsel-Wisconsin.

Mae Whiteside Williams
(CE '99), Chicago, was recognized by *Crain's Chicago Business* as a 2021 Notable Women in Construction and Design. She also received a Professional Achievement Award at the 2021 Alumni Awards Ceremony on September 18, 2021.

2000s

Mayari Pritzker
(Ph.D. PSYC '01), Chicago, received the Collens Merit Award at the 2021 Alumni Awards ceremony on September 18, 2021.

Gina Arquilla DeBoni
(LAW '02), Glenview, Ill., was sworn in as a member of the Glenview, Illinois, Village Board of Trustees.

James Ciston
(AE, MME '04), Oakland, Calif., received an Outstanding Young Alumnus Award at the 2021 Alumni Awards Ceremony on September 18, 2021.

Piyush Desai
(M.S. EE '04, Ph.D. '09), Des Plaines, Ill., received a Profes-

sional Achievement Award at the 2021 Alumni Awards Ceremony on September 18, 2021.

Barbara Flores
(LAW '04), Chicago, received a 2021 Carole K. Bellows Women of Influence Award from the Illinois State Bar Association.

Bhuvana Srinivasan
(ME, AE '04), Blacksburg, Va., was named the Crofton Faculty Fellow in Engineering by the Virginia Polytechnic Institute and State University Board of Visitors.

Joyce Tan Vela
(ARCH '04), Chicago, was elected to Habitat for Humanity Chicago's Board of Directors.

Lilianna Kalin
(LAW '05), Woodridge, Ill., was recognized by *Crain's Chicago Business* as one of the 2021 Notable General Counsels.

Ayesha Ahmed
(LAW '06), Glenview, Ill., was recognized by *Crain's Chicago Business* as one of the 2021 Notable General Counsels.

Jeremy Edelson
(LAW '06), Glenview, Ill., was recognized by *Chicago Daily Law Bulletin* as one of its 40 Under Forty for 2021.

Hana Ishikawa
(ARCH '06), Chicago, was recognized by *Crain's Chicago Business* as part of its 2020 Notable Women in Construction and Design.

Chris Schelling
(M.S. FM '06), Austin, Texas, published his first investment book, titled *Better than Alpha: Three Steps to Capturing Excess Returns in a Changing World*, which was published by McGraw-Hill in March 2021.

Gerald Bekkerman
(LAW '07), Chicago, received an Outstanding Young Alumnus Award at the 2021 Alumni Awards Ceremony on September 18, 2021.

Amy Gibson
(LAW '07), Northbrook, Ill., was recognized by *Chicago Daily Law Bulletin* as one of its 40 Under Forty for 2021.

Angela Drexel
(INTM '08), East Hazel Crest, Ill., was recognized by *Crain's Chicago Business* as part of its 2020 Notable Women in Construction and Design.

Rashi Khurana
(M.S. ITM '09), Jersey City, N.J., received an Outstanding Young Alumna Award at the 2021 Alumni Awards Ceremony on September 18, 2021.



[From left] University Regent John Rowe and Jeanne Rowe at the rededication ceremony for the Jeanne and John Rowe Village residence hall on Mies Campus



PHOTO COURTESY OF FOX

[From left] Leslie Milton (DSGN '79) and her daughter, Emma, on the FOX television show *Crime Scene Kitchen*.

Dessert Detective

Leslie Milton (DSGN '79) never saw herself on national TV sifting through trash cans and filthy kitchen counters to concoct vibrant macaron towers and delicate croquembouche.

But when her daughter, Emma, sent her an email with the subject line “IMPORTANT” and a casting notice for the FOX competition show *Crime Scene Kitchen*, the idea made sense: Emma was an actor and a self-taught baker, and Leslie an accomplished pastry chef with her own custom pastry business, Goodnight Kitchen, and an education from the French Pastry School in Chicago.

“[The show] was something I never even knew I wanted to do,” says Milton.

Milton had not always been a pastry chef. She only began her business in 2017, and attended pastry school the year prior. The decision to begin baking—professionally—came after years of work as a stay-at-home mother and as a graphic designer. After she graduated from the Institute of Design at Illinois Tech, she spent years at J.P. Morgan as a corporate

graphic designer and eventually an executive, before leaving to raise Emma.

“There’s a bizarre but very solid relationship in the way a person thinks when they’re doing graphic design or baking,” says Milton. “There are rules, there are structures, and there are problems and solutions. I love that baking is more of a precise art, so it just appealed to me.”

Milton says, in a way, her ID education would come into play on *Crime Scene Kitchen*. The show’s conceit has contestants rifle through a messy kitchen to deduce what had been baked, then make it themselves; the most accurate and tastiest re-creation wins. When it came to analyzing clues, Milton was in familiar territory: “My mind really responds to solving problems, both aesthetically and through critical thinking. That’s what they taught us at ID,” she says.

The mother-daughter team made it to the final episode of *Crime Scene Kitchen*, and though they were the first to be eliminated in the finals, as far as Leslie is concerned, they made it all the way to the end. — **Andrew Connor**

Immerse Yourself in Illinois Tech

Stay in touch with Illinois Institute of Technology through the Illinois Tech Alumni Association or by volunteering your time, making a contribution, or networking in the following ways:

Host a Virtual Event

You can help Illinois Tech lead the way by hosting a virtual event for donors, potential students, or alumni. Support the admissions staff by leading a workshop or panel, or support the Office of Advancement by organizing special networking opportunities.

Serve on a Board or Committee

The Alumni Board is actively seeking new members who are committed to advancing Illinois Tech's mission and vision. You can become involved by serving on committees in several areas of interest from admission and career opportunities to nominations.

Connect and Mentor

Join The Bridge, Illinois Tech's online networking and mentorship platform. Connect with current students and fellow alumni, offer job advice, or find a mentee. Register for The Bridge at iit.wisr.io.

Volunteer with Admission or Career Services

Greet students and alumni, offer your expertise, or volunteer at events ranging from advice panels to career fairs through the admission or career services offices.

To sign up, visit alumni.iit.edu/volunteer-signup



[Top left to bottom right] Richard Price (EE '71), William Glynn (MATH '71), Bonnie Benzies (M.S. PSYC '71, Ph.D. '80), and University Regent Alan "Bud" Wendorf (ME '71) celebrate the 50th reunion of the class of 1971 and receive medallions commemorating their induction into the Golden Society.

Robert Patillo

(LAW '09), Atlanta, was sworn in to serve on the Board of Directors of the National Association of Criminal Defense Lawyers.

Price Vetter

(ME '11), Palatine, Ill., returned to IBM as a client technical leader after four years with Discover Financial Services.

2010s

Elizabeth Corson

(CHE '11), Palo Alto, Calif., graduated with a Ph.D. in chemical engineering from the University of California, Berkeley. She is now a Tom-Kat Center for Sustainable Energy postdoctoral fellow at Stanford University.

Dunstan Barnes

(LAW '13), Chicago, was recognized by *Chicago Daily Law Bulletin* as one of its 40 Under Forty for 2021.

Dorian Karter

(CIS '13), Munster, Ind., has recently been promoted to lead software engineer at Boulevard. He leads a team that is innovating at the intersection of beauty and technology.

Julie Levinson Pustilnik

(LAW '11), Chicago, was recognized by *Chicago Daily Law Bulletin* as one of its 40 Under Forty for 2021.

Tara Stringfellow

(LAW '13), Cordova, Tenn., will have her debut novel, *Memphis*, released in March 2022 by Penguin Random House.

Kathleen Opal

(LAW '11), Chicago, was recognized by *Chicago Daily Law Bulletin* as one of its 40 Under Forty for 2021.



Mies van der Rohe Society members enjoy an architecture boat cruise following a tour of the Chicago Architecture Center.

Daisy Ayllon

(LAW '14), Chicago, was recognized by *Chicago Daily Law Bulletin* as one of its 40 Under Forty for 2021.

Rob Kohen

(LAW '14), Chicago, was recognized by *Chicago Daily Law Bulletin* as one of its 40 Under Forty for 2021.

Elizabeth Butler

(LAW '15), Chicago, was recognized by *Chicago Daily Law Bulletin* as one of its 40 Under Forty for 2021.

Ryan Cummings

(CE '15), Chicago, joined the Midwest team for Nicholson Construction as a business development associate.

Cara (Cummings) Karter

(CECD '15), Munster, Ind., started her M.Ed. at the University of Illinois Chicago and has joined mRelief full-time as a research associate. At mRelief, she focuses on improving access to the SNAP program and on decreasing food inequity through her research.

Holly (Seiler) Pepper

(ARCE '15), Chicago, passed her professional engineer exam and is working toward her years of service requirement at ESD, Inc. as an electrical engineer.

Stephen Pepper

(BA '15), Chicago, started as a client arrangements analyst for Sidley Austin LLP in its Chicago office.

Conner Wiebell

(BME '16), San Francisco, has joined the Astellas Gene Therapies team as a process engineer, where he will be driving manufacturing process scale-up and technology transfer of gene therapy candidates.

August Hieber

(LAW '19), Chicago, was recognized as a Top 40 Young Lawyer by the American Bar Association and its On the Rise awards program.

2020s

Hitanshu Rami

(CS '21), Schaumburg, Ill., started a career with General Motors after graduating from Illinois Tech.

Spotlight



Remembered in Ice

Penguin colonies, a subterranean ice chapel, and sea ice were not top-of-mind military-related topics for Private First Class **Thomas L. Pavlak (CE '60)** as he was visiting his family in Chicago's Garfield Ridge neighborhood over the 1961 Christmas season. The frosty subjects became so, however, after he received a phone call informing him that his new duty orders had been changed from Texas to Antarctica. With his background in civil and structural engineering, Pavlak was selected to serve as a research program glaciologist with the United States Army Cold Regions Research & Engineering Laboratory, Experimental Engineering Division, at the South Pole Station from 1962–63.

Nearly 60 years later Pavlak reflected on his major contribution to polar science in a phone conversation from his home in hot and sunny Las Vegas.

"At that time there were no permanent above-ground stations at the poles," he explained, noting that, for example, Byrd Station, a former west Antarctic research station, was built entirely under the snow. Staff entered the station via snow hatches on the surface. A veritable village was below, complete with a nondenominational chapel, living quarters, and supply chambers.

Pavlak was assigned the task of determining how quickly the snow would inch forward or "creep," and then close in on the tunnels and above-ground station structures temporarily built by crew members at three different stations in Antarctica and Greenland. He and colleague René O. Ramseier published their findings in the paper "Unconfined Creep of Polar Snow" in the *Journal of Glaciology* (vol. 5, no. 39, October 1964). The pair took core ice samples and analyzed creep as a function of density; all three sites showed three different mechanisms of densification. Their paper provided the groundwork for more studies that eventually allowed for surface stations to be constructed.

In 1967 the U.S. Board on Geographic Names honored Pavlak with the naming of Pavlak Glacier, located at 82 degrees 58 minutes south latitude, 163 degrees 12 minutes east longitude, south of the Nimrod Glacier in Antarctica. After his years in the service, Pavlak worked as chief structural engineer for Chicago Public Schools, before retiring in 1993.

"My years working on the polar project were a really exhilarating experience," says Pavlak, "from sitting on the Ross Ice Shelf to flying back to the U.S. with my six tubes of snow samples keeping cold in the back of the plane." —**Marcia Faye**

Share Your News!

We want to hear from you. Send us your class note by visiting alumni.iit.edu/class-notes. Submissions may be edited for style and brevity.

An Update from the Alumni Board Chair **Sherrie Littlejohn**



AT COMMENCEMENT THIS spring, I told Illinois Institute of Technology's newest alumni that as much as it's true that we are living through unprecedented times, the truth is that all of us are *always* living through unprecedented times and what distinguishes us is our ability to meet unforeseen circumstances with optimism, courage, and grit. History is written day by day by those with the persistence to set a new precedent.

Armour Institute broke precedent in 1890 when it was founded with the purpose of liberating the collective power of difference to advance technology and progress for all. The founders of what would become Illinois Tech did not have a land grant from the state, or any other affiliations beyond the common cause of preparing students from all walks of life for professional careers.

Their persistence has resulted in more than a century of Illinois Tech alumni setting new precedents as designers, engineers, lawyers, inventors, social psychologists, entrepreneurs, artists, chemists, astronauts, executives, and many other professions working in dozens, if not hundreds, of industries all around the world. Illinois Tech alumni aren't only responsible for creating unprecedented innovations like magnetic tape recording, the cell phone, and Amazon's Alexa, but also for setting precedents closer to home like by being the first member of their family to obtain a college degree or the first to embark on a professional career path.

As Illinois Tech strives to meet the goal of empowering diverse learners with the skills to thrive in the future, we are in an unprecedented moment, with unprecedented support from alumni and friends. President Raj Echambadi wants to build on this momentum and set Illinois Tech on the path to unprecedented preeminence. We have the opportunity to double down on our founding purpose and to lift up young people from around the globe, including students in the university's neighboring communities. Wherever students originate, I know each of them will fit in.

The culture we enjoyed as students was shaped by the alumni that came before us, the students, faculty, staff, friends, and neighbors in the community. As an alumna, I'm motivated to support Illinois Tech because I believe we can set a new precedent for reaching more students than ever before with the opportunity to come to the place where being different isn't just OK, it's an honored and respected ideal. You might be motivated by something different, and that's exactly why I want your support. Visit iit.edu/alumni or email us at alumni@iit.edu to find out how you can power the difference for today's students.

Sincerely,

Sherrie Brown Littlejohn (M.S. CS '82)

Trustee, Board of Trustees
Chair, Alumni Association Board of Directors



Gunsaulus | SOCIETY

The Gunsaulus Society is named after Frank Gunsaulus, the first president of Armour Institute of Technology and orator of the famed “Million Dollar Sermon,” which led to Armour’s founding and eventually, the establishment of Illinois Institute of Technology. The guiding principles set forth by Frank Gunsaulus continue to resonate: belief in the advancement of knowledge, the cultivation of invention, and the importance of preparing students for a life of achievement, service, and fulfillment.

An estate gift to Illinois Tech demonstrates your commitment to the values that were instilled at our founding, which is why we recognize your gift with induction into the Gunsaulus Society, a highly respected group of individuals who, like Frank Gunsaulus, put their beliefs into action for a better future.

**Joining the
Gunsaulus Society
is easy**

Let us know of your intentions to leave Illinois Institute of Technology in your will or if you have named the university as a beneficiary of an asset including your IRA. Did you know that the IRS regards any remaining balance left in your IRA to be untaxed income? There are significant tax advantages to making charitable gifts with your IRA.

If you intend to name Illinois Institute of Technology as a beneficiary of your IRA, notify us, and we will share wire transfer or mail instructions for your plan administrator.



The SECURE Act changes the required age that you begin to take your required minimum distribution to 72. If you leave your IRA to most non-spousal heirs, they are required to receive the funds over 10 years and to pay income tax.

If you are age 70½ or older, you may transfer up to \$100,000 annually from your IRAs directly to Illinois Institute of Technology without being subject to income taxes on the distribution. When you reach age 72, it will count toward your required minimum distributions.

Mary Elizabeth Spies Droste (ARCH '42)

MARY ELIZABETH SPIES DROSTE—the first woman to graduate from Illinois Institute of Technology’s College of Architecture and a former member of the college’s Board of Advisors—passed away on February 14, 2021. She was 100 years old.

Droste came to the College of Architecture to study under Ludwig Mies van der Rohe after graduating from the University of Arkansas at age 17. In addition to serving on the College of Architecture’s board, she was a significant financial supporter of the College of Architecture, which included contributing to the renovation of S. R. Crown Hall. In 2014 she was the honorary chair for the first Mies Crown Hall Americas Prize, along with former Chicago Mayor Rahm Emanuel.

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Marsha Spak (LAW '79)

MARSHA SPAK, who for years served as president of Chicago-Kent College of Law’s Law School Association and dedicated much of her time to helping law school graduates pass the bar exam, passed away in February at the age of 78.

In 1992 Spak received the law school’s Distinguished Service Award. When Conviser Law Center opened, the Spakateria (a cafeteria) was named in honor of Marsha and Mike Spak in recognition of their generosity to the school.

“Marsha was a mentor to hundreds of students. A caring and devoted mother. Generous with both time and financial support of many organizations including Chicago-Kent—a place that she loved. She will be missed,” says Peter J. Birnbaum, a member of Chicago-Kent’s Board of Advisors and a friend of the family.

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John Guzzardo (LAW '04)

JOHN GUZZARDO, an alumnus and mentor within the bankruptcy program at Chicago-Kent College of Law, passed away in June at the age of 49.

A partner at HMB and chair of the firm’s Litigation Group, Guzzardo assisted Professor of Law Adrian Walters, who also serves as the director of the program in business law at Chicago-Kent, in advising students who aimed to pursue careers in bankruptcy and restructuring law.

“He frequently met with students at my request and spoke on careers panels,” Walters says of Guzzardo. “He was one of my best alumni and market contacts—always willing to help out, always cheerful, and we miss him greatly.”

In Memoriam

Alumni

Donald F. Crego (ME '41)
Mary Elizabeth Droste (nee Spies) (ARCH '42)
Richard R. Levin (ME '44)
Clarence G. Bergstrom (CHEM '45, Ph.D. '51)
Marshall Miles (EE '45)
George A. Wyatt (ME '48)
Albert E. Cout (ID '49)
R. L. Kovanda (ENGL '50)
Ernest W. Nordquist (CE '50)
Shao Yuen Z. Yuan (CHE '50)
Leslie J. Laskey (ID '51)
Rudolph George Novak (CHE '51)
Donald P. Dimmitt (ID '52)
Thomas Houser (CHEM '52)
Richard K. Johnson (CE '52)
Charles W. Starbuck (IE '52)
Nancy E. Waterman (nee Shepul) (HE '52)
Richard K. Hoffman (LAW '53)
Herbert Bruce Keil (LAW '53)
Roger F. Reedy (CE '53)
Donald Lee Sickler (ARCH '53)
Joseph L. Jenista (CHEM '54, M.S. ENVE '84)
Richard R. Schubert (BE '54)
Ronald B. Diamond (MET '55)
Frank A. Field (ME '55)
Albert M. Sciaky (EE '55)
Sherwin E. Small (ARCH '56)
John R. Munson (ARCH '57)
Robert T. Ruff (LAW '57)
Harold A. Schroeder (MATH '57)
Frank A. Berczynski (ME '58)
Dolores Cherny (IE '58)
Robert T. McGrath (EE '58)
Frederic Randa (EE '58)
Matthew Turina (ME '58)
Jovo Martich (ME '59)
Fredric L. Ware (Ph.D. PSYC '60)
Soumya K. Banerjee (M.S. ARCH '61)
Frank R. Fitzgerald (IE '61, M.S. MGT '76)
Alan R. Hirsig (CHE '61)
James L. Goy (CE '62, M.S. '67)
Thomas John Grenchik (M.S. EE '62)
Laird A. Scott (ID '62)
Kenneth P. Stromsland (ARCH '62)
Kenneth R. Anderson (PS '63)
Robert Denes (M.S. ME '63)
James J. Poremba (EE '63)
William John Schaeffle (LAW '63)
Richard Charles Medley (MS '64)
John K. Cook (MATH '65)
Dewey Roscoe Jones (LAW '65)
Mitchell W. Panek (ME '65)
Chaudhary Ajit Singh (M.S. IE '65)
Neil B. Johnson (EE '66)
Thomas Karabatsas (LIB '66)
Gerald E. Delaney (EE '67)
S. Jeffrey Garfield (Ph.D. PSYC '67)

Hermann M. Schamberger Jr. (LAW '67)
Janis S. Taurins (MAE '68)
Reza Ahmari (M.S. EE '69, Ph.D. '72)
Russell J. Chobot (PSYC '69)
Frank John Doti (LAW '69)
Jerome James Lutz (LAW '69)
Carmen Carl Adducci (CE '70)
Chester John Dick Jr. (CE '70)
Utkan Salman (ARCH '70)
Walter D. McFall (CHE '71)
Robert A. Neufeld (M.S. PSYC '72, Ph.D. '80)
Karen M. Ellers (MATH '73, M.B.A. '80)
Michael J. Femal (LAW '73)
Michael D. Gertner (LAW '73)
Edward R. Rabe Jr. (LAW '73)
Roy C. Wahl (MGT '73)
Thomas P. Moncada (LAW '75)
Gerald E. Yingling (EE '76)
John A. Frey (CS '77)
Mary Jo J. Field (nee Laflin) (ID '78)
Russell J. Kleifgen (CHE '79)
Marsha C. Spak (nee Chait) (LAW '79)
Jay E. Degroot (LAW '86)
Thommen Mathew Poozhikunnel (M.S. CS '95)
David O. Saalfeld (BIOL '95)
Terry A. Hankins (M.S. FMT '96)
Akiko Noguchi (M.S. CS '00)
Kimberly Marie Bliss (M.S. ACHM '03)
John W. Guzzardo (LAW '04)
Kristin Rylko (LAW '05)
Timothy Nunes (M.S. MCOM '09)
Emmett M. Shaughnessy (LAW '14)
Briana J. Mayes (LAW '16)

Non-Degree Alumni

Joseph J. Barclay
Barbara S. Herst
Helmut Jahn

Friends

James Blair
Richard H. Driehaus
Gilbert Feldman
Janet Jentes
Ruth F. Kapes
Lisa F. Kittler-Stevens
Frederick A. Krehbiel
Robert Meers
Harold J. Miller
Doyle W. Rausch
John F. Sandner
Zalman Philip Saperstein
Barbara Jean Schneider
Kathleen R. Springer
Kay Trevarthen

Faculty/Staff

Leslie Axelrod



In this undated photo, students from Bronzeville look at a water cannon on a fire boat in Chicago with Illinois Tech staff. (photo courtesy of University Archives and Special Collections)

Connecting to the Community

The methodologies may have changed over the last few decades, but the purpose remains clear: in working to become a valued member of the communities in which it resides, Illinois Institute of Technology aims to channel the passion, commitment, and talent of the students in Bronzeville and other South Side neighborhoods in Chicago through pre-college programs.

In the past, those programs brought students to campus over the summer for academic and athletics activities that were led by members of the Illinois Tech community. Now, with the development of the DevUp Scholars program, Illinois Tech is providing an interactive three-year program to expose high school students to STEM and entrepreneurship, to connect them with mentors, and to prepare them to pursue STEM majors and careers. —**Andrew Wyder**



Before You Go

Jonte' Williams (ASPY, PHYS 3rd Year) may have his sights set on a career that would allow him study the mysteries of space, but his focus right now is on something much closer to the ground—helping Illinois Tech Hyperloop design a subscale prototype pod vehicle and build 400 feet of track to compete in an annual hyperloop competition. Above, Williams works on the pod vehicle in a lab on Mies Campus.

Photo: David Ettinger



Keep in touch.

Visit www.iit.edu/university-news or follow us on social media to learn about all that is happening at Illinois Tech.

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