THE POWER OF PENN
THE CAMPAIGN MAGAZINE
SPRING 2019

At Home on Campus
Cracking the Code of Innovation at GSE
The Big Picture at Penn Vet
Every time I step on campus, I’m invigorated by the sense of purpose in everyone I pass. Penn students, faculty, and staff all share a common bond: they’re striving to make a positive impact on campus, in their community, and in the world. And, as you’ll see in this magazine, The Power of Penn Campaign is helping them do just that. From revolutionary breakthroughs in medical research to transformational student support initiatives, the impact of The Power of Penn is all around us. I hope you enjoy this look into the host of exciting developments happening across the University.

Robert M. Levy, WG’74
Chair, The Power of Penn Campaign
Vice Chair, Board of Trustees
A STEP FORWARD for Design
PENN NAMES SCHOOL OF DESIGN IN RECOGNITION OF STUART WEITZMAN'S LIFETIME COMMITMENT AND SUPPORT
Penn this year named its School of Design for award-winning designer and footwear icon Stuart Weitzman, W’63, in recognition of his longstanding engagement with and philanthropic support of the University.

Weitzman is one of the most recognizable names in luxury designer footwear, but he is very invested in education—at Penn and beyond. Since stepping down from an active role in business, he has lectured at universities around the world and mentored many students interested in starting their own businesses.

“Stuart has been an inspiration to the thousands of students with whom he has connected in large lecture and smaller classroom settings, and through one-on-one conversations,” said President Amy Gutmann. “His lifelong support of the University and the School of Design truly aligns his own body of work in design with his ongoing commitment to Penn in the most meaningful and impactful way.”

Regarding the naming, Weitzman said, “This is my way of thanking the University of Pennsylvania for the education that was the foundation of my long and incredibly enjoyable career in design. It is my privilege to support new scholarships, and to invest in the overall academic mission of the School, including the advanced technologies and systems so essential to the future of design.”

In addition, the School’s central plaza, located adjacent to College Green between Meyerson Hall and Fisher Fine Arts Library, will be named The Stuart Weitzman Plaza and will undergo significant redesign and renovation in the upcoming months by renowned landscape architect, Laurie Olin, Practice Professor Emeritus of Landscape Architecture at the School.

The Stuart Weitzman School of Design is consistently ranked among the country’s top design schools, preparing students to address complex sociocultural and environmental issues through design, architecture, landscape architecture, city and regional planning, fine arts, and historic preservation. Weitzman’s outstanding support will provide increased financial aid for the School’s students and provide resources to dramatically strengthen its signature programs, in alignment with the School’s Power of Penn Campaign goals.
NEW ENERGY ON CAMPUS

Record Gift from Roy and Diana Vagelos to Create
New Energy Science and Technology Building

THE WORLD’S NEED FOR CLEAN RENEWABLE ENERGY is one of the most urgent challenges facing society today. Finding solutions to address this need is one of the Campaign’s top priorities—and a $50 million gift to Penn Arts and Sciences from P. Roy Vagelos, C’50, PAR’90, HON’99, and Diana T. Vagelos, PAR’90, will help the University do just that. Their gift—the largest in the School’s history—will create a new state-of-the-art facility to connect the scientists and engineers seeking to advance new knowledge and technologies. Among these are researchers in the Vagelos Institute of Energy Science and Technology and the Vagelos Integrated Program in Energy Research (VIPER).
Supporting Penn’s Campaign priorities to incubate innovation, advance knowledge, and expand student opportunities, recent gifts from two Wharton alumni are making possible groundbreaking initiatives in the future of finance. In February, Joshua J. Harris, W’86, and his wife Marjorie Harris made a gift to name the Joshua J. Harris Alternative Investments Program. The program integrates cutting-edge research into the Wharton curriculum and supports its presentation at public forums. Ross Stevens, W’91, recently established the Stevens Center for Innovation in Finance, which will advance essential knowledge about information technology’s impact on the financial services industry. The impact of both initiatives will be far reaching, bringing benefits for students, faculty, businesses, communities, and individuals around the world—truly, advancing knowledge for good.

This June, the Penn Museum’s colossal 3,300-year-old Sphinx is moving from its perch for the last 93 years in the lower Egyptian Gallery to a prime new location in the Main Entrance Hall. When the reimagined main level of the Museum opens in November, the Sphinx will provide a monumental greeting to visitors from all over the world. The Sphinx’s move is just part of the exciting activity taking place under the auspices of the Penn Museum’s Building Transformation Campaign, which is fundamentally about changing how visitors and students alike engage with the human story through the Museum’s collections, galleries, and programs.
When Barbara Dallap Schaer, V’94, Medical Director of New Bolton Center, first learned of a novel imaging system being developed, she was intrigued. Pairing advanced computed tomography (CT) imaging with cutting-edge robotic technology, it offered a paradigm-shifting approach to looking inside a living body. “I could easily see,” she recalls, “how it could solve two or three problems we regularly encounter in imaging horses.”

After becoming more familiar with the system, she and her colleagues at New Bolton Center, Penn’s large animal hospital in Kennett Square, began to consider a host of other possibilities opened by the technology. “Right out of the gate, we could imagine translational opportunities that really excited us,” says Dallap Schaer. And she knew that Penn, with its commitment to innovation and cross-school collaboration, would be the perfect place to cultivate the nascent technology.

Soon after, New Bolton Center became the first veterinary teaching hospital to install a robotics-controlled imaging system for use with standing horses. In 2016, it began testing and developing the promising but then-unproven technology.

Today that technology has become the centerpiece of New Bolton Center’s planned Advanced Imaging and Translational Center—a key priority of The Power of Penn Vet Campaign. Its development has resulted in a pioneering system that produces high-quality efficient imaging of horses. And it has catalyzed a growing array of applications that could hold great promise for human health.

“Every day, working with the robots brings a new advance, a new discovery,” says Dallap Schaer. Extending and applying that potential to animals and humans will be a primary focus of the new center.
THE TECHNOLOGY

Unlike traditional CT, which entails anesthetizing a horse and fitting it into a narrow scanning unit, robotics-controlled CT brings imaging to the horse. Horses remain awake and standing as scanners on mechanical arms move around the area being examined. The seconds-long process, which also uses high-speed motion detection cameras, is designed to work with a modicum of movement by the horse.

Able to produce highly detailed imagery and get to parts of the body formerly out of reach, the technology has advanced diagnosis and treatment. It has also provided critical guidance and imaging during complicated surgeries and opened up exciting new areas of study. Orthopedic, neurological, and cardiac cases have made extensive use of it, but its applications to other specialties and species, says Dallap Schaer, “are almost unlimited.”

A LOOK INSIDE

A new intraoperative robotic CT system developed specifically for New Bolton Center will anchor the Advanced Imaging and Translational Center. Other plans for the 33,180-square-foot facility include a state-of-the-art operating room; patient preparation area; and a new high-field MRI unit, one of the only magnets of its kind on the East Coast.

In addition to expanding imaging services for animals, the new center will lead the way in evaluating robotic CT’s potential for human patients.

MINING MOTION

The system’s ability to work with patient motion is one of its most compelling attributes. Already, Penn Vet and Penn Medicine are collaborating on adapting it for use with pediatric patients unable to stay still during imaging. The brief imaging process could be completed as a child plays on an iPad or talks with a parent.

Even more intriguing is the technology’s potential to portray a body in motion—a feat that no imaging modality has accomplished to date and which Dallap Schaer calls “a game changer.”

New Bolton Center teams are at work programming their robots to capture images of a horse in motion; their ultimate goal is to image a horse running on a treadmill. Meanwhile, collaborations with Penn Medicine seek to apply the technology to humans. Success in this area, says Thomas Schaer, Director of Penn Vet’s Preclinical Service Core and Translation in Orthopedic Surgery, could vastly expand our understanding of human movement and also advance diagnosis and treatment of disease.

“Evaluating patients while they are moving could reveal why they have pain,” says Schaer, or suggest why joint degeneration occurs, touching on just a few of the pathbreaking possibilities.
At Penn, eminent faculty members lay the foundation for unprecedented advancements in research, scholarship, and practice—which is why support for them is a cornerstone of The Power of Penn Campaign. The very best professors do much more than achieve outstanding heights in their individual careers: they also help attract and retain the top graduate students, building powerful teams for research and discovery, and preparing the next generation of experts whose work will make a difference in our world.

Made possible by visionary donors, endowed professorships are a powerful tool for the recruitment and retention of faculty members. Appointment to a named, endowed position provides public recognition of extraordinary scholarly achievement and represents a significant honor in the academic world. Endowed professorships can also foster innovation by providing assured institutional support for research and programs. Reliable funding frees scholars to take the creative risks necessary to make groundbreaking discoveries that benefit Penn and the world.

Here, four faculty members describe the impact their appointments have made on their lives and work.

“Endowed professorships do more than show the University’s appreciation for a scholar’s accomplishments. The appointment signals to the rest of the world that the holder is one of Penn’s finest. The fact that I hold an endowed professorship has definitely enhanced my professional reputation and has opened up opportunities that would not otherwise have come my way.”

Christopher Yoo
John H. Chestnut Professor of Law, Communication, and Computer and Information Science
Future holder of the Imasogie Professorship in Law and Technology
Director, Center for Technology, Innovation, and Competition
Penn Law
“Support from the Andrea Mitchell Professorship has turbocharged what I can do. I have a multipronged research group that is working to understand the hardening of international borders around the world over the past couple of decades. Momentum and the right assemblage of skills are key to innovative and impactful work. That doesn’t fall in your lap—it takes real resources to put it all together.”

**BETH SIMMONS**
Andrea Mitchell University Professor of Law, Political Science, and Business Ethics
Penn Arts and Sciences, Penn Law, and Wharton

“Last year, an elite research university tried to recruit me by offering me an associate professorship with tenure. Penn responded by offering me an associate professorship with tenure and an endowed professorship. This showed me that my contributions to Penn are valued and that Penn is a place where I can flourish.”

**QUAYSHAWN SPENCER**
Robert S. Blank Presidential Associate Professor of Philosophy
Penn Arts and Sciences

“My grandparents did not have the chance to get an education, and my parents gave up a lot to get theirs and make mine possible. The meaning of all that came into focus in the days after I found out that I had been awarded the Garchik Family Professorship. I was humbled to know that my research and teaching were being recognized, grateful to my family and mentors for the sacrifices they made on my behalf, and so thankful to the Garchik family and to the University’s leaders for the honor.”

**EXQUEL HERNANDEZ**
Max and Bernice Garchik Family Presidential Assistant Professor
Wharton

“Globalization

- How do you think about national security?
- What is the role of international relations in global politics?
- What changes in law, culture, and technology have impacted international relations?”

- How can you apply these concepts to current events?
ODAY’S STUDENTS CAN SWIPE, TYPE, AND TAP THEIR DEVICES, BUT IS THIS ENOUGH? Experts at Penn’s Graduate School of Education say no. In order to be informed citizens of the digital world, it is essential that students also understand the technology behind the screen.

“Coding is the new literacy,” says Yasmin Kafai, the Lori and Michael Milken President’s Distinguished Professor at Penn’s Graduate School of Education (GSE) and Chair of its Teaching, Learning, and Leadership Division. “In today’s ‘Internet of Things,’ computing has already moved out into the real world. We need to develop curricular and instructional activities that incorporate these kinds of applications.”

A world-renowned learning scientist and author, Kafai designs tools that empower students through computer programming. Her work seeks to teach coding through hands-on projects that appeal to and are accessible to students who are statistically less likely to pursue careers in STEM fields, such as women and people of color.

Stitching the Loop, Kafai’s curriculum unit on electronic textiles, is now being implemented in school districts across the country. Using a combination of fabric, conductive thread, and other electronic components, students can create products such as bookmarks that can double as book lights or wristband sensors that can detect sweat. Kafai’s research has shown that these projects teach students to flex their creative muscles, sharpen their problem-
solving abilities, and build strong connections with one another. And crucially, students come away with a new understanding of what computer science can be—and who can be a part of it.

Kafai has also collaborated with the Stuart Weitzman School of Design’s Orkan Telhan to bring the emerging field of synthetic biology to Philadelphia-area high schools using wet-lab kits that serve as tabletop biofabrication machines. Using the kits, students learn how to make smells, colors, and shapes with microorganisms. The kits are both affordable and portable, which makes them accessible to school districts that may not have dedicated laboratory space or expensive equipment.

Early exposure to complex fields like biotechnology and programming helps prepare students interested in these fields by teaching them how cutting-edge tools can be used to create new products—especially products that can help solve some of the world’s most pressing economic and ecological challenges. And for all students, the benefits of hands-on, collaborative problem-solving lessons are transferable across multiple elements of learning and life.

“Education is the greatest tool for creating solutions to seemingly intractable problems,” says GSE Dean Pam Grossman, noting that support for innovative, impactful programs such as Kafai’s is a key priority of GSE’s Extraordinary Impact Campaign.

“We need to be constantly innovating so that students are equipped to become informed citizens who understand the technology they interact with every day, and are empowered to succeed in a changing, interconnected world.”
TANGEN HALL
At Tangen Hall, students from all of Penn’s schools will find the resources and support they need to transform their ideas into viable products and services, and ultimately into scalable, sustainable businesses. Wharton-led, Penn-wide, and building on the University’s rich student entrepreneurial culture, the approximately 70,000-square-foot facility at 40th and Sansom Streets will house signature programs, such as Venture Lab, the Stevens Center for Innovation in Finance, the Joshua J. Harris Alternative Investments Program, and the Jay H. Baker Retailing Center, and usher in a new era of innovation and entrepreneurship at Penn. Students utilizing Tangen Hall will have access to maker spaces operated by Penn Engineering, a virtual reality cave, a test kitchen, and a retail store for student ventures, thanks to a donation made by the AKO Foundation on the recommendation of Katja and Nicolai Tangen, W’92. The project is expected to be completed in the fall of 2020.
WHARTON ACADEMIC RESEARCH BUILDING
Wharton has long been a leader in quantitative analysis, and as one of the only business schools in the country with its own statistics department, Wharton is leading the way in the development, teaching, and application of business analytics. The new five-story Wharton Academic Research Building near the corner of 37th and Spruce Streets will provide centralized space for this work. It will provide an ideal environment for instruction, collaboration, and research, and provide attractive, mixed-use space for the entire Wharton community. The top floors will be used for academic departments and offices. Located adjacent to Steinberg Hall-Dietrich Hall and the Mack Pavilion, the striking triangular-shaped building will create a gateway both to Penn’s main campus and to Wharton’s western precinct. The building will include an open-air plaza along a restored Woodland Walk from 36th to 37th Streets. The project is expected to be completed in the fall of 2020.

VANCE HALL
Wharton’s Vance Hall is undergoing a major capital project that includes the renovation of the third and fourth floors, as well as a much-needed mechanical upgrade to support these spaces. The newly designed floors will be occupied by two Wharton academic departments, multiple centers, and Ph.D. students. When completed, it will have a series of faculty and staff offices, conference rooms, support spaces, and workstations. Philadelphia-based architects HOK designed the floors to be a mix of modern and traditional. Finishes include glass walls, walnut paneling, ceramic tile, and exposed concrete. Finishes selected for the project are sustainable, as this project is currently targeting LEED Gold. This phase of the project is due to be completed in summer 2019.
Penn’s newest residence is putting the resources students need right at their fingertips. With a building that cultivates intellectual life, creates spaces for community, and incorporates sustainable design elements, New College House West will soon become an iconic fixture on the western edge of the University’s campus.

The new building will be the 13th House in Penn’s College House System, a collection of residential communities that help students integrate their academic and personal lives by encouraging learning outside of the classroom and supporting learning inside of it. The College Houses bring together nearly 5,600 Penn students into communities that offer cultural, academic, and recreational events; personal services; leadership opportunities; and more.

New College House West’s layout and design borrow much from the success of New College House—both buildings were designed by the same architecture firm—and took into account feedback from students about how spaces are used in their day-to-day lives.

The new residence for sophomores, juniors, and seniors will accommodate 450 students in multiple-bedroom suites. Each suite contains a living room and private bathrooms.

“We did a lot of work with the students to determine the most effective configurations,” explains Anne Papageorge, Vice President for Facilities and Real Estate Services.

The design of New College House West, located at the campus gateway of 40th Street and Locust Walk, features a meaningful investment in public open space, according to
How College Houses Expand the Student Experience

“The College Houses are vital connectors with other parts of the Penn community,” says Cam Grey, LPS’13, Associate Professor of Classical Studies and Faculty Director of New College House.

Grey holds a “faculty family dinner” every week, where students can join him and his family to talk about their schoolwork, life at Penn, or anything else that happens to be on their minds. It is one of the ways he has found to demonstrate to students how learning happens outside the classroom as well as inside of it.

Because Grey and his young family live in New College House, he can help students exercise intellectual curiosity in their home lives, he explains. And beyond his interactions with students, a diverse slate of programming, from academic talks to artistic performances, keep things busy throughout the academic year.

University Architect Mark Kocent, C’82, GCP’91, GFA’91, PAR’16, including a new common green, rain gardens, and native tree species—all of which will benefit both Penn students and residents of West Philadelphia. The building’s design also considers the environmental impact of the structure, meeting the specifications for LEED Silver certification, with green roofs, bird-friendly glazing, and other advances in sustainable design.

New College House West will open in the fall of 2021 in conjunction with the launch of the Second Year Experience program. Based on several student wellness task force recommendations, this program supports the unique needs of second-year students with resources for academic advising and pre-professional exploration, as well as a new two-year housing requirement. By expanding such purpose-built space, New College House West will help to ensure that students have access to the resources that will help them thrive in their second year and beyond.
ENGAGE WITH THE POWER OF PENN

Over the past year, The Power of Penn Campaign has provided exciting new opportunities for alumni, parents, and friends to engage with the University—from attending events, to supporting priorities, to volunteering both on campus and regionally.

BY THE NUMBERS

THE POWER OF PENN CAMPAIGN

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THE POWER OF PENN TOUR EVENTS

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REGIONAL ALUMNI CLUBS HOSTED THE POWER OF PENN CELEBRATIONS

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FACULTY SPEAKERS

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ALUMNI SPEAKERS

5000+
ATTENDEES WORLDWIDE

600+ VOLUNTEERS HAVE SERVED ON HOST COMMITTEES FOR UNIVERSITY CAMPAIGN EVENTS

Including THE 1ST HOST COMMITTEE IN ASIA

SHARE YOUR EXPERIENCES!
Submit your Penn stories and photos online here: powerofpenn.upenn.edu/share-your-experiences
MEET MARC LO
Executive Director of Penn First Plus

In May 2018, the University announced plans to create the Penn First Plus program to enhance support for first-generation, low-income students. Executive Director Marc Lo explains the need for this program and why Penn’s efforts resonate with him personally.

Q WHAT IS YOUR VISION FOR BUILDING AND GROWING PENN FIRST PLUS?
A The foundation of Penn First Plus will be a network of faculty and staff who support students in their learning and personal growth. This network will make an institution as large and resource-dense as Penn easier to navigate for students and their families.

In partnership with academic units and University Life, our faculty co-directors Camille Charles, PAR’22, and Robert Ghrist, PAR’21, and I will grow Penn First Plus by thinking through how we can best help our colleagues enhance their current efforts—and launch new initiatives—to support first-generation, low-income students.

Q CAN YOU ENCAPSULATE THE PENN FIRST PLUS PROGRAM?
A Penn First Plus will serve as a focal point for the University’s efforts to support the socioeconomic diversity of its undergraduates. We are thinking holistically about the student experience—from financial and social resources to academic programming and alumni engagement—so that students receive a high level of support and timely referrals across campus.

Our purpose is to examine the Penn experience so that any student—from any background—can make the most of a Penn education. We expect to see improvements in student academic achievement and graduation rates, a deepened sense of community and belonging, more participation in co- and extracurricular opportunities, and less financial pressure.

Q HOW DID YOUR BACKGROUND AS A FIRST-GENERATION, LOW-INCOME STUDENT IMPACT YOUR ACADEMIC JOURNEY AND CAREER PATH?
A As an undergraduate at Northeastern University, I was fortunate to find jobs on campus that helped me understand how the institution worked, advocate for myself, and help fellow students who needed additional support. Those experiences shaped my career and my philosophy that a student should be able to come into Penn First Plus and have their concern addressed or be immediately connected to someone who can help them. This student-centered approach is important because the more time it takes a student to find the support they need, the less time they can devote to their studies.

Q WHAT SORT OF DIFFICULTIES DO OUR FIRST-GENERATION, LOW-INCOME STUDENTS FACE?
A First-generation, low-income students may also feel that they are not as qualified to attend Penn because they see their peers having what appears to be an easier experience. Another challenge reported by some first-generation students is how to communicate their experience to their families—especially when there might not be a full understanding of the opportunities college provides.

Q HOW CAN THE PENN COMMUNITY HELP SUPPORT FIRST-GENERATION, LOW-INCOME STUDENTS?
A In the coming months, I will be working closely with Alumni Relations to identify the best ways volunteers might engage with our initiatives, especially through mentorship opportunities. How much we can accomplish, and how quickly, is also dependent on financial resources—alumni and others can make a huge impact through philanthropic support for our programs. Donors who wish to help can contact our Undergraduate Financial Aid development office to talk more about supporting Penn First Plus directly or via contributions to Penn’s wide range of scholarship programs.

First-generation, low-income students may also feel that they are not as qualified to attend Penn because they see their peers having what appears to be an easier experience. Another challenge reported by some first-generation students is how to communicate their experience to their families—especially when there might not be a full understanding of the opportunities college provides.

“I believe in inclusive excellence—the idea that opportunities to excel should be equitably accessible to all members of our educational community, and that our diversity also makes us excellent.”