

# Experience in the world, for the world



POWERED BY **Northeastern University**

The background is a dark, textured surface. On the right side, there are several overlapping circles in shades of brown and tan. A bright teal light source is positioned near the center of these circles, creating a lens flare effect with radiating lines and a soft glow. The text "2022 INSTITUTIONAL ACCOMPLISHMENTS" is centered horizontally and partially overlaid by the circles.

## **2022** INSTITUTIONAL ACCOMPLISHMENTS

*All statistics reflect 2021–2022 data unless otherwise noted.*





## EXPERIENCE BEYOND MEASURE

In the past year, Northeastern has made extraordinary strides in realizing the promise and potential of its growing global university system. From London to Oakland, from Vancouver to Charlotte, we offer unprecedented opportunities to our students, faculty, and partners to create the high-impact experiences that meet their goals.

As we reach new heights, we embark on our new fundraising campaign: Experience Powered by Northeastern. Over the next five years, this campaign will spur innovative new partnerships across our global system, create unmatched new experiences in interdisciplinary learning and research, and achieve the bold vision of our new academic plan, *Experience Unleashed*.

I extend my deepest thanks to all within the Northeastern family for bringing the university to this inflection point. Let us now join together as a truly global community to reinvent our university to better serve society.

Sincerely,

Joseph E. Aoun, President

NORTHEASTERN •  
1898 •



# Our global university system

Our campuses in the U.S., the U.K., and Canada—including seven of North America's leading technology markets—expand learning, discovery, and innovation experiences for students, faculty, and partners.



## NEW GLOBAL SYSTEM MILESTONES

We're the first U.S. school to earn the university title in England, and our U.K. campus is now Northeastern University London, with plans to offer **dual U.K./U.S. degrees** from the bachelor's through the doctorate.

Our merger with Mills College in Oakland, California, makes Northeastern the **only university** in the U.S. with fully residential campuses for learning and research on both coasts.



# Learning

HARNESSING GLOBAL  
EXPERIENCE

149 countries

where Northeastern has provided  
experiential learning opportunities,  
up from 60 in 2006



14 campuses

in the U.S., U.K., and Canada that  
fuel a range of opportunities to  
learn in new contexts

## An immersive aerospace residency in Seattle

**Shaked Lotem** dreams of contributing to humanity's exploration beyond our world. He took an exhilarating leap toward realizing his vision by enrolling in Northeastern's new aerospace minor and the aerospace residency at Northeastern's Seattle campus. The immersive eight-week program—integrating courses with opportunities to connect with industry leaders and leading aerospace companies—has brought the mechanical engineering major even closer to his career goals.





## Learning

WORLDWIDE REACH

2,934

co-op employers  
across the U.S.  
and worldwide

91,000

undergraduate applications

for fall 2022, and a **7% acceptance rate**

12,127

co-op placements

worldwide, **up from 6,301** in 2006

93%

of graduates employed full  
time or in graduate school

within 9 months of graduation  
(multi-year average since 2006)



### Finding her own global network

**Sharan Sekhon** never thought studying abroad was in her Northeastern future. But a global-study fair led the politics, philosophy, and economics major to Serbia for a Dialogue of Civilizations summer program on the Balkans. That experience drew Sekhon back to Serbia for a co-op at the Centre for Applied Nonviolent Action and Strategies, and then to Switzerland for a Dialogue on the United Nations. Those unexpected experiences have connected her to people who've become mentors in her academic journey.



## Learning

PERSONALIZED AND LIFELONG

19,957

learners in graduate degree  
and certificate programs

up from 5,410 in 2006

2,400+

partners in our  
Experiential Network

have provided 13,000 learners at all  
levels of study with 3,000 real-world  
projects since 2015

26 NSF Graduate  
Research Fellowships

held by current PhD students,  
up from 1 in 2006



### Opening doors with an accelerated master's

To turn her passion for environmental sustainability into a career, international affairs/economics major **Kaitlyn Cavallaro** felt she needed more depth in the sciences. Enter Northeastern's PlusOne program, which offers undergraduates an accelerated track to a master's degree. Cavallaro's PlusOne in environmental science and policy will open more professional doors when she completes her master's degree in 2023.

### Changing paths, breaking into tech

**Kris Barnes'** degree in economics and commerce landed him a National Park Service job, but he was eager to build a career in computer science—without leaving his beloved Maine. Barnes found a path to both goals at Northeastern's Roux Institute in Portland. The Align master's program in computer science, designed for those without a bachelor's degree in the field, will enable Barnes to help propel Maine's burgeoning tech economy as well as his own success.





# Achievement

## TALENT IN ACTION

Students won nationally competitive awards supporting global study and experience

American Chemical Society Excellence in Graduate Polymer Research Award

Barry Goldwater Scholarship

Churchill Scholarship

Fulbright Scholarship

George J. Mitchell Scholarship

J.P. Morgan PhD Fellowship

National Defense Science and Engineering Graduate Fellowship

National Institute of Aging–NIH Research Training Fellowship

National Science Foundation Graduate Research Fellowship

Schwarzman Scholarship



### Schwarzman Scholarship

Arlen Agiliga, '22

A finance major with an interest in emerging markets, Agiliga will pursue a master's degree in global affairs at Tsinghua University in Beijing through his Schwarzman Scholarship.



### Fulbright Scholarship

Amanda Brea, '22

With a passion for teaching theater and mentoring young people, Brea will use her Fulbright Scholarship to teach English in Spain, and to lead public speaking and improv classes for people in the community.



### Fulbright Scholarship

Nicole Occidental, '22

A neuroscience major with a focus in social neuroscience, Occidental will devote her Fulbright Scholarship to studying the long-term effects of virtual learning on kids at Maastricht University in the Netherlands.



### Churchill Scholarship

Cameron Young, '22

With his Churchill Scholarship, Young will study toward a master's degree in medical science at Cambridge University in England. He will work with Cancer Research UK to study the diverse ways the disease manifests.



### Barry Goldwater Scholarship

Giona Kleinberg, '23

With research experience in neurological diseases, Kleinberg won a Barry Goldwater Scholarship. He plans to earn both a doctorate and a Doctor of Medicine degree in developmental neurobiology.



### Barry Goldwater Scholarship

B. Parazin, '23

A physics and math major with extensive research experience, Parazin received a Barry Goldwater Scholarship and will pursue a doctoral degree in geophysics. They plan to study landforms on Earth and in space.

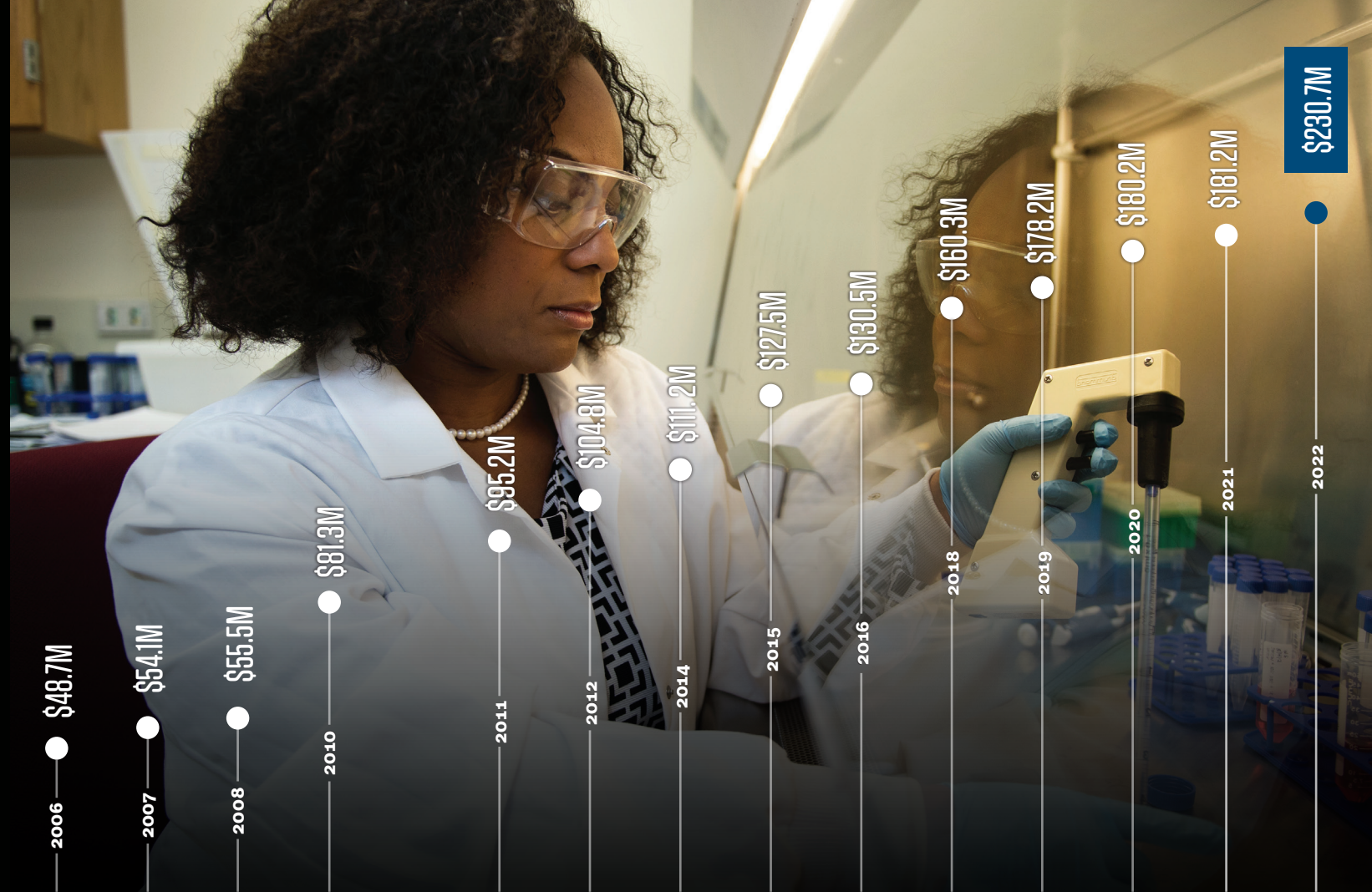




# Research

DISCOVERY BEYOND BOUNDARIES

**\$230.7M** external  
research  
funding  
an increase of 374%  
since 2006



## A PhD powered by transcontinental experiences

En route to a PhD in electrical engineering, **Jared Miller** has traveled far. He is seeking to optimize the control systems that automate everything from cars to power plants. A Chateaubriand Fellowship took him to France's national Laboratory for Analysis and Architecture of Systems last spring. Guided by LAAS and Northeastern mentors, he shared ideas at European conferences, published papers, and sharpened his thesis—real-world learning he calls “invaluable.”





## Research

IMPACT ON HEALTH, SECURITY,  
AND SUSTAINABILITY



### Floating wetlands designed to protect coastal cities

Northeastern Assistant Professor Julia Hopkins is part of a startup that is developing interconnected rings of floating wetlands to stave off coastal city flooding. Aptly named “Emerald Tutus” consist of biodegradable, circular mats seven feet in diameter. By growing marsh grasses on top and seaweed below, the mats act like sponges to absorb wave energy. Emerald Tutus are already in the water near Salem, Massachusetts.

### A \$36M collaboration to safeguard ‘soft’ targets

Northeastern is leading a multidisciplinary consortium of universities in seven states plus Puerto Rico to build a surveillance system protecting so-called soft targets—such as schools and churches—from mass shootings and other threats. The system will provide decision-makers with the vital information they need to assess situations and coordinate responses. The Department of Homeland Security awarded Northeastern \$36 million to lead the center and build the system.



### Seattle-Boston AI expertise to advance healthy aging

Seattle data scientist and computational biologist Ram Hariharan is partnering with Northeastern colleagues in Boston to build an “aging clock” to measure individuals’ biological aging rates. It’s powered by AI that learns from patient data, including changes from the molecular to the behavioral across the lifespan. The work is part of a larger quest to understand and prevent age-related diseases, such as cancer, by pinpointing when they start and delivering individually targeted cures.



### Multi-campus study helping unlock COVID-19 mysteries

Northeastern researchers who devised the university’s protocol to test for and evaluate the spread of SARS-CoV-2 are gaining insights into the virus’s evolution and the puzzling variabilities of COVID-19. Experts at the Life Sciences Testing Center and the Observational Health Data Science and Informatics Center are basing their study on anonymized data collected from mid-2020 to mid-2022 at Northeastern campuses in Boston and Charlotte, North Carolina.





# Faculty

EXPANDING OUR  
CAPACITY TO INNOVATE

# 126

faculty with  
interdisciplinary  
appointments

up 200% since 2012

# 863

tenured and  
tenure-track hires

since 2006, including  
61 in 2021-2022



## NEW FACULTY RECRUITS

We're pleased and proud to welcome talented new faculty, including the following recent hires.



**Sofia Bosch Gómez**  
Assistant Professor of  
Art+Design  
Joint appointment with  
Northeastern's Burnes  
Center for Social Change



**Mauricio Santillana**  
Professor of Physics  
and Electrical and  
Computer Engineering



**Patrice Collins**  
Assistant Professor of  
Criminology and Criminal  
Justice, and Cultures,  
Societies, and Global Studies



# Achievement

## AWARDS, HONORS, AND THE CALL TO SERVE



### Fellow, American Association for the Advancement of Science

**Penny Beuning**  
Chair and Professor, Chemistry and  
Chemical Biology

Beuning was recognized for her key findings about how cells respond to DNA damage, and for her outstanding contributions to the advancement of chemical research in toxicology.



### Attorney advisor to the chair, Federal Trade Commission

**Rashida Richardson**  
Assistant Professor of Law and Political Science

Richardson, an expert in the social and civil rights implications of data-driven technologies, advises the chair on issues of data privacy and security. She previously served as a senior policy advisor at the White House Office of Science and Technology Policy.



### Emerging Leader Abie Award

**Kristen Dorsey**  
Associate Professor of Electrical and Computer Engineering, joint appointment in Physical Therapy, Movement and Rehabilitation Sciences

Dorsey was honored by AnitaB.org, a global organization promoting the success of women and nonbinary people in technology, for her early-career research achievements in soft sensors and significant impact in advancing diversity.



### Member, National Academy of Engineering

**Jerome F. Hajjar**  
Chair and CDM Smith Professor, Civil and Environmental Engineering

Hajjar was elected for landmark research that, as cited by the NAE, has led to the development of “design criteria and models for stability and seismic design of innovative steel and composite structures.”



### Fellow, American Association for the Advancement of Science

**Hazel Sive**  
Dean, College of Science; Professor of Biology

Sive was recognized for fundamental discoveries advancing our knowledge of early embryonic development, and for her leadership in teaching, mentoring, and promoting diversity in higher education.



### Member, U.S. Civil Rights Cold Case Records Review Board

**Margaret Burnham**  
University Distinguished Professor of Law; Director, Civil Rights and Restorative Justice Project

Burnham was confirmed by the U.S. Senate on the strength of her expertise in civil rights law and leadership of the CRRJ, which shares the review board’s mission to investigate cases of racial violence during the Jim Crow era.



### Knight of the Order of the Star of Italy

**Alessandro Vespignani**  
Sternberg Family Distinguished University Professor of Physics, Computer Science, and Health Sciences

Vespignani was honored for his work tracking the spread of COVID-19 and other disease epidemics, and for helping to integrate Italy’s scientists, research centers, and public health officials into these global efforts.



### Fellow, American Association for the Advancement of Science

**Elizabeth Mynatt**  
Dean and Professor, Khoury College of Computer Sciences

Mynatt was selected for exceptional computing community leadership and her distinguished research contributions to human-centered computing, with a focus on assistive technologies, wellness, and health.



# Entrepreneurs

## POWERING INVENTION

### Roux Institute attracts Chilean startup to Maine

In remote settings, field workers in forestry, shipping, and other industries must contend with poor communication networks. Chilean entrepreneur Max Echeverría founded Eskud to develop a data management platform to solve that problem—then relocated his startup to Portland, Maine, and Northeastern's Roux Institute. Eskud was among 10 startups to receive funding and mentoring through the institute's inaugural Techstars Accelerator.



### Network of support for DeafBlind accessibility venture

Samantha Johnson, E'21/MS'21, founded Tatum Robotics to develop empowering technology for the DeafBlind community. The startup is developing a low-cost robotic hand to fingerspell tactile sign language and a safe, compliant arm to sign more complex words and phrases. In addition to support from Northeastern's student-run venture incubator, IDEA, Johnson earned first place in the Women Who Empower 2022 Innovator Awards.



### Product design gets an AI makeover

New-product development relies on traditional techniques for market research like focus groups, customer interviews, and sales data. Ada Tech LLC is creating a platform to reinvent the innovation process, harnessing artificial intelligence to understand customer needs and enhance product diversity and market impact. The startup's co-founders—Northeastern professors Paolo Ciuccarelli, Tucker Marion, and Mohsen Moghaddam—received a National Science Foundation grant for their cross-disciplinary work.



### San Francisco residency inspires footwear startup

With a passion for fashion, Gabrielle Whittle has created a shoe that can be worn as high-heeled or flat, thanks to its adjustable sole and detachable heel. The College of Engineering alumna developed the idea during her Semester in San Francisco, Northeastern's immersive entrepreneurship residency. Whittle used techniques from her prior product design work to bring her vision to life, aided by a \$10,000 Innovator Award from Women Who Empower.



## Diversity, equity, and inclusion

### OUR COLLECTIVE COMMITMENT

“We’re hoping to elevate the voices and concerns of our peers—whether by amplifying the actions of other organizations or by directly tackling issues that impact our community’s most vulnerable populations.

With the continued commitment from Northeastern to listen to and communicate with students, we believe we have the power to make this campus a more inclusive environment.

—Angelica Jorio, '24, and  
Sebastian Chavez, '24

STUDENT GOVERNMENT ASSOCIATION  
PRESIDENT AND EXECUTIVE VICE PRESIDENT

24% increase in  
underrepresented  
minority students  
since 2020

20% increase in first-year  
underrepresented  
minority students  
since 2020

\*Underrepresented minority students include Hispanic/Latino, Black/African American, American Indian or Alaska native, and native Hawaiian or Pacific islander

71% increase in first-year  
underrepresented  
minority students  
since 2006

“It is only through embracing diversity and cultivating inclusivity across all areas that we can impact lasting change.

—Carmen Sceppa

DEAN OF THE BOUVÉ COLLEGE OF HEALTH  
SCIENCES, IN SUPPORT OF THE FIRST  
UNIVERSITYWIDE RACIAL AND CULTURAL  
LITERACY TRAINING PROGRAM

“I’m using what I have learned about social justice and public service in Boston and Oakland to lead the Northeastern Votes Coalition, a nonpartisan group dedicated to advancing civic engagement and voter turnout across Northeastern’s global community. Experiences like these are the reason I and so many others chose Northeastern.

—Olivia Oestreicher, '25

EXECUTIVE DIRECTOR OF COMMUNICATIONS, STUDENT GOVERNMENT  
ASSOCIATION, AND NORTHEASTERN VOTES COORDINATOR, OFFICE OF  
COMMUNITY SERVICE AND CIVIC ENGAGEMENT



# Pride & Support

CELEBRATING EXPERIENCE

**\$99.2M**  
in gifts and pledges

FY 2021-2022

# EXPERIENCE

**Powered by Northeastern**

## Our most ambitious campaign yet

Worldwide support for Northeastern is growing stronger than ever. That's why, this fall, the university launched Experience Powered by Northeastern, our most far-reaching, innovative campaign yet.

In the coming five years, our university community will seek to raise \$1.3 billion, elevating both fundraising and engagement. Supporters will connect with the university and each other in a multitude of ways, including mentorship, advocacy, and traditional philanthropy.

### KEY CAMPAIGN PRIORITIES

- Student Opportunities
- Faculty Excellence
- Research
- Diverse Connections
- Entrepreneurship
- Global Exploration



Pride & Support

GIFTS THAT DRIVE INNOVATION



Fellows for pharmas

Across the U.S., pharmacists are in short supply. That’s why Vertex Pharmaceuticals, Ipsen Bioscience Inc., and Blueprint Medicines have each made gifts to fund two-year doctoral fellowships that will bring Northeastern students into these companies. Successful graduates will be prepared to step into permanent industry positions. In Boston, a hotbed for the pharmaceutical and biotech industries, Northeastern runs the country’s third-largest pharmacy doctoral fellowship program.

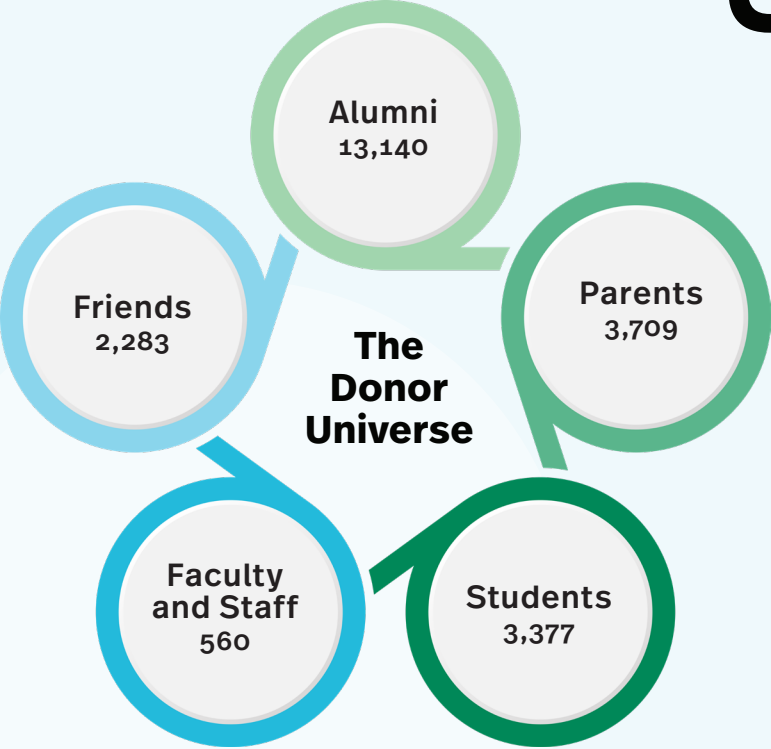


Championing first-generation students

Thomas McDonough, DMSB’71, former chair of the D’Amore-McKim School of Business Dean’s Council, and his wife, Olivia, LA’71, are among the many Northeastern supporters who are opening doors to achievement for underrepresented students. Their gift of \$100,000 established the Thomas and Olivia McDonough Opportunity Scholarship to ease financial constraints for talented business undergraduates who are the first in their families to attend college.

Pride & Support

HIGH-IMPACT GIVING



634 corporate and foundation gifts and pledges totaling \$63 million

23,069 individual donors from 72 countries, including 10,288 first-time donors



## Pride & Support

GIFTS THAT NURTURE  
FUTURE GENERATIONS



### Preparing next-gen material scientists

Breakthroughs in methods of growing and slicing crystals can propel revolutionary advances in products from cellphone screens and solar panels to windows in spaceships. That's why Fred Schmid, ME'67, has established a second research fellowship at his company, Crystal Systems Innovations. His philanthropy will help Northeastern nurture a new generation of materials scientists.

### Improving pathways into computer science for women

Northeastern's Center for Inclusive Computing partners with community colleges and four-year institutions to enhance pathways to computing degrees for women and increase their representation in the field. The CIC does this through grantmaking, technical advising, and data services. In the past year, the Cognizant Foundation, Hopper-Dean Foundation, and the Public Interest Technology Infrastructure Fund (a hosted project of New Venture Fund) supported the CIC and its mission with investments totaling more than \$3 million.



### Empowering veterans and servicemembers

Created with a \$3 million pledge, the new Ruby W. and LaVon P. Linn Foundation Veteran and Active-Duty Servicemember Scholarship will help defray tuition expenses for military-affiliated students to ensure their successful transition to civilian life. The Linn Foundation, which has long partnered with Northeastern to support veterans and active-duty servicemembers, has challenged the university to raise an additional \$1.5 million to help these learners reach their educational and career goals.



### New access points for international students

Created with a \$2.85 million commitment from parents Talal Kamal Shair and Maha Shair, Northeastern trustee (above), the Shair Family Scholarship helps ensure that exceptional students from Lebanon and Jordan are able to embrace a full range of opportunities available at Northeastern. Through this gift, Shair Scholars will gain the education and experience to make a meaningful impact on communities around the globe.

### Expanding our library's legacy

For students and faculty, the Northeastern University Library is a space where state-of-the-art resources spark collaboration, creativity, and discovery. With an estate gift, Charles F. McGrath Jr., CJ'80, has pledged \$2.5 million to the library, building on its legacy as a hub of learning for the Boston campus and now, the global university system. The gift will expand resources and facilities that foster intellectual and professional growth.



## NORTHEASTERN GIVING DAY

### Giving Day sets a record!

On Northeastern's fifth annual Giving Day, the university's global community raised a record \$3 million for students, faculty, research, and other priorities. More than 7,500 donors from 29 countries contributed to the 24-hour, in-person and virtual fundraising effort, supporting programs from global co-op to women's rowing. Donors met more than 50 fundraising goals, generously backing student groups, academic programs, and athletic teams.



## Pride & Support

ALUMNI AND COMMUNITY

# 300,000+

alumni live and work  
in 181 countries

# 11,400+

participants

from **149 countries** engaged in  
**337 programs and events**

# 49

Northeastern  
communities on  
four continents

Asia, Europe, North America, and  
South America



### INSPIRATION

#### Calling on grads to 'keep your future open'

During her address in May to 2022 College of Professional Studies graduates, executive coach and author Priscilla Douglas, E'70, MEd'74, exhorted graduates and future business leaders to remain open to new experiences, opportunities, and relationships. Earlier, she talked with Huskies about putting equity and inclusiveness into action in the workplace, the focus of her latest book, *Woke Leadership: Profits, Prophets & Purpose*.

### EXPERTISE

#### Getting real about cryptocurrency

Cryptocurrency is plagued by volatility and predatory traders. Molly White, KCS'16, is a prominent, prolific critic of this largely unregulated global industry, using her website, Web3 is Going Just Great, to expose scams, out unreliable actors, and help keep people from going broke. One U.S. senator recently sought White's input on pending cryptocurrency legislation, and her work has been profiled in major media outlets, including *The Washington Post* and *The Guardian*.



### MENTORSHIP

#### Sharing the ABCs of angel investing

In 2022, alumnae Marjorie Radlo-Zandi, DMSB'83 (above, left), and Katya Porteymour, DMSB'22 (right), hosted a conference on speaking to angel investors interested in supporting business founders. Radlo-Zandi drew from decades of experience, while Pourteymour is new to angel investing. Together, they and an audience of Northeastern alumni and friends explored the angel investor's mindset.



## Pride & Support

NETWORKED FOR CHANGE



### CREATORS

#### Huskies treated to alum's hit NYC production

In May, Saheem Ali, AMD'03, welcomed Huskies to New York City's Public Theater, where he is associate artistic director and the director of *Fat Ham*, a play by James Ijames. In this homage to Shakespeare's *Hamlet*, a queer college student is exhorted to avenge his father's death. The production was a *New York Times* "Critic's Pick."



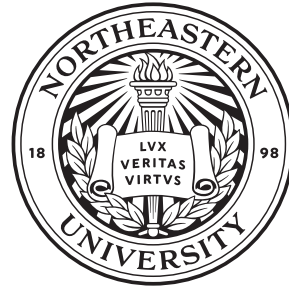
### CHANGEMAKERS

#### Integrating community and hospital care teams

Northeastern PhD candidate Cynthia Orofo, BHS'19, is an entrepreneur who aims to bring better healthcare to underserved populations. Her startup, the Culture Care Collective, is a health support program and app that integrates community health workers and their cultural knowledge into care teams at hospitals. Orofo's fledgling company won a 2022 Innovator Award from Northeastern's Women Who Empower in the graduate student category.

# LVX VERITAS VIRTUS





OFFICE OF THE PRESIDENT  
NORTHEASTERN UNIVERSITY

[accomplishments.northeastern.edu](https://accomplishments.northeastern.edu)