

A photograph of the Campanile tower at Vanderbilt University at night. The tower is illuminated with warm yellow lights, standing out against a dark blue twilight sky. In the foreground, a large brick building is mostly in shadow, with some windows glowing. Trees on either side are decorated with strings of small, warm white lights. The overall mood is serene and academic.

DRIVING INNOVATION FORWARD

VANDERBILT CENTER FOR TECHNOLOGY
TRANSFER AND COMMERCIALIZATION

2026



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Bridging Ideas, Improving the Human Condition

The real-world impact of Vanderbilt's research is felt globally. When we are able to bridge the gap between early discovery and the marketplace, we deliver tangible benefits to society in the form of new products and services. We can even save people's lives. Look no further than the Crash Cushions technology protecting drivers on most major highways, or Evusheld, which provided a critical shield for the immunocompromised during the pandemic and was deployed in our own hospitals across Tennessee – including VUMC – protecting and rescuing people in our own community.

Beyond saving lives, this bridging between ideas and products can improve the human condition on a broader scale. Technologies like Indego, the powered exoskeleton giving mobility back to those with paralysis, and Read180, which has revolutionized literacy for millions of students, started as disruptive ideas in our laboratories on campus and are now used by individuals around the world.

Leveraging the incredible innovations that spring from our research laboratories and clinical settings can also serve as a powerful engine for economic impact. Vanderbilt startup companies HeroWear (revolutionizing workplace safety through wearable exosuits) and nPhase (developing VUMC's REDCap software for clinical trials data management for the commercial sector) are attracting capital, creating jobs, and generating revenues. Together, these two ventures alone have already created more than 200 jobs since their launch, demonstrating that Vanderbilt's intellectual capital is a driver of economic growth in the region and beyond.



We currently find ourselves in a perfect storm of opportunity. University and Medical Center leadership have cultivated an unprecedented environment to support innovation and entrepreneurship.

CTTC recognizes this opportunity and is doing its part to ensure the moment is not missed. We have streamlined our processes and launched new programs specifically designed to contribute to the expansion of innovation capacity across campus, to the lowering of barriers for innovator engagement, to the preparation of entrepreneurs for success, and to the growth of both internal and external partnerships. Some examples of these programs are described in this publication – please visit our website or reach out to us to learn more about any of these efforts and how our faculty can take advantage of them.

CTTC is here to support Vanderbilt faculty and staff from every corner of campus—from engineering and medicine to the basic sciences and humanities, and from less obvious pockets of creativity scattered throughout the schools and administrative units. Engagement is the key. Our goal is for our Vanderbilt innovators to view us as their strategic partners in ensuring their innovative ideas achieve the long-term support and scale they deserve. We look forward to helping our community members turn their next breakthrough into the world's next big solution.

Some of the stories of recent breakthroughs are recorded in this edition of *Driving Innovation Forward*. We hope that you find them as inspiring as we do.

Sincerely,

A handwritten signature in black ink that reads "Alan Bentley". The signature is fluid and cursive, written in a professional style.

Alan Bentley, M.A.
*Assistant Vice Chancellor for Technology
Transfer & Intellectual Property Development*

FY25 INNOVATION IMPACT

\$13,640,549

REVENUE GENERATED

\$32,756,528

SPONSORED RESEARCH RELATED TO TECHNOLOGY TRANSFER ACTIVITIES

231

New
Invention
Disclosures

519

Individual
Vanderbilt
Submitters

*197 First Time
Submitters*

80

Departments,
Divisions,
Institutes,
& Centers
Engaged in
Tech Transfer

284

U.S. Patent
Applications
Filed

53

U.S. Patents
Issued

104

Licenses
& Options

16

Vanderbilt
Affiliated New
Ventures

278

End-User
Transactions
Executed

1031

Material
Transfer
Agreements
Reviewed

54

Confidential
Disclosure
Agreements

207

Sponsored
Research
Agreements
Reviewed

29

Clinical Trial
Agreements
Reviewed



"Vanderbilt's record-breaking year underscores our commitment to getting innovative solutions into the world faster. Commercialization and tech transfer provide critical pathways to translate faculty discoveries into real-world impact. These achievements reflect the ingenuity of our faculty, the strength of our industry partnerships, and the CTTC team's dedication to driving innovation and entrepreneurship." **Provost C. Cybele Raver**

FY16–FY25

10-YEAR SNAPSHOT

1,887 INVENTIONS DISCLOSED

611 U.S. PATENTS ISSUED

929 LICENSES EXECUTED

\$305.1M REVENUE GENERATED

66 STARTUPS LAUNCHED

FY16–FY25

VANDERBILT RESEARCH

\$9.69B

Total Research
Expenditures

\$5.99B

Federal Research
Funding

\$670M

Industry Sponsored Research

LICENSING ACTIVITIES



Chris Harris
Executive Director
of Licensing

In FY25, CTTC experienced growth in technology disclosures, licensing transactions, industry-sponsored research, and startups launched—demonstrating the university's commitment to expanding the innovation ecosystem.

"We are incredibly proud of the strong performance from the licensing team in executing so many deals across such a wide variety of technology areas, taking that next step on the path from the laboratory to the marketplace, enabling real-world impact."

IN FY25, THE TEAM EXECUTED 104 LICENSING TRANSACTIONS, WHICH INCLUDED 89 LICENSE AGREEMENTS AND 15 OPTION AGREEMENTS.

LICENSE AGREEMENTS

Licenses are the contractual way that Vanderbilt grants rights to a company to develop and commercialize a university invention.

The university keeps ownership of the intellectual property, while granting the company (licensee) specific rights, such as to make, use, or sell the technology. In return, the company agrees to financial and development terms, which may include equity, fees, royalties, and milestones, among other terms and conditions.

THE 89 LICENSE AGREEMENTS INCLUDED:

19 **exclusive licenses*** with major pharmaceutical companies, startups, and others in a wide range of fields including cancer, Parkinson's disease, and postpartum hemorrhage treatments.

**a typical contractual vehicle for technologies where the licensee will need to fund significant further development and where exclusivity is important.*

70 **non-exclusive licenses** including end-user license agreements such as through VU e-Innovations, CTTC's online licensing platform

OPTION AGREEMENTS

Options are temporary agreements between Vanderbilt and a prospective company that allow time for due diligence and/or securing development funding before committing to a full license.

Options typically provide a 6–12 month exclusive evaluation period during which Vanderbilt agrees not to license the technology to others, while the company decides whether it wants to take the next step, usually an exclusive license.

Though not used exclusively with startups, option agreements are a common first step for startups who may need time to explore the market or to raise initial funding before committing to the license. In FY25, 12 of Vanderbilt's 15 option agreements were signed with startups.

EXAMPLE: SJC BIO

A startup formed to develop biodegradable dental bone grafts invented by **Scott Guelcher**, professor of chemical, molecular, and biomedical engineering.

SCJ Bio first signed an option in 2024 and, after promising fundraising efforts, signed an exclusive license in 2025.

OTHER KEY FY25 ACHIEVEMENTS

- Processed a record 231 new invention disclosures, representing 519 total inventors, 197 of whom disclosed for the first time.
- Supported Vanderbilt investigators in securing \$32.8M in industry-sponsored research, highlighted by collaborations with major pharmaceutical and biotech companies.
- Assisted in launching a record-breaking number of 16 startups, demonstrating remarkable growth in new ventures based on Vanderbilt technologies (more on page 5)

"There is a nationwide trend toward focusing more effort in academia to support entrepreneurship and commercialization of valuable institutional assets through startup creation. Our team is working hard to ensure that Vanderbilt remains at the forefront of those efforts."

Alan Bentley, Assistant Vice Chancellor for Technology Transfer & IP Development

DID YOU KNOW?

Vanderbilt's E-Commerce Platform

VU e-Innovations is CTTC's online licensing platform for Vanderbilt-developed software, surveys, training materials, datasets, courseware, and specialized products.

VU e-Innovations automates licensing of intellectual property assets through standard click through end-user agreements—covering both digital products and physical products—and enables free access to select product offerings for academic and nonprofit users.

Since the platform's launch in 2008, 26 product families have generated more than \$2.2M in licensing revenue. In FY25, VU e-Innovations generated about \$170,000 and processed 550+ product/license orders.

VU e-Innovations products include:

MFA Suite™: A metabolic flux analysis software suite for bioprocess manufacturing from Jamey Young, professor of chemical and biomolecular engineering.

STAT™: A screening tool kit for early detection of autism developed at Vanderbilt Kennedy Center.

LeachXS™: A data management and visualization tool to help scientists analyze results of leaching tests, developed by David Kosson, professor of civil and environmental engineering, and colleagues from School of Engineering.

LAPOP™: Annual license subscription to public opinion polling datasets, from the Department of Political Sciences.

Researchers interested in releasing their software, courseware, surveys or any other digital copyrightable materials may contact the VU e-Innovations team at info@vueinnovations.com



FY25 Startups Commercializing Academic Research

Vanderbilt's startup launch milestone showcases faculty's dedication to innovation, paving the way for future growth. CTTC's New Venture Development team guides Vanderbilt innovators from research discovery to company launch, providing proof-of-concept validation and viability testing, along with business plan and go-to-market strategy guidance.

The team's efforts are closely coordinated with CTTC's Licensing team, who leads the license negotiations with the newly formed startup while managing Vanderbilt's protection of the intellectual property earmarked for these startups.

Adviser Labs

A command-line or web-based software tool that provides a user-friendly interface to run any existing computational science or learning code in the cloud.

David Hyde, assistant professor of computer science; Ravindra Duddu, professor of civil and environmental engineering

Arena Therapeutics

Targeted brain modulation as a treatment for patients diagnosed with Parkinson's disease.

David Charles, professor and vice-chair of neurology; Mallory Hacker, assistant professor of neurology

Aura Life Science

A technology that enables industries to reduce production costs while transforming their chemicals, ingredients, and inputs into bio alternatives with negative CO₂ emissions.

Carl Johnson, professor of biological sciences, molecular physiology and biophysics

Bardo Climate

Scaling-up and manufacturing bipolar membranes with transformative performance and durability.

Peter Pintauro, research professor of chemical and biomolecular engineering

Brim Analytics

A software that leverages AI to streamline the process of extracting data from electronic medical records (EMRs) into structured fields.

Daniel Fabbri, associate professor of biomedical informatics

Bullseye Biodevices, Inc

A medical device company creating a non-destructive pressure-assisted tissue stiffness measurement device.

Matthew Bacchetta, professor of cardiac surgery, thoracic surgery, and biomedical engineering

db Twin

A state-of-the-art non-deep learning synthetic data generation technique that addresses the challenge of accessing high-quality training data for AI and machine learning models.

Aditya Nanda, research assistant professor

ImageAssist

A clinical photography tool that standardizes patient imaging.

Michael Golinko, associate professor of plastic surgery, otolaryngology-head and neck surgery, and neurosurgery

iPrivacy Lab Co.

Leveraging alternate data streams to design and implement a data protection method that misleads the ransomware into attacking only file "shells" instead of attacking the actual file content.

Dan Lin, professor of computer science

FY25 STARTUPS CONTINUED

Kifa Therapeutics

A first-in-class small molecule specifically targeting the genetic form of Parkinson's disease, offering a potential disease-modifying therapy.

Craig Lindsley, professor of pharmacology, biochemistry and chemistry

Metionic Technologies

A novel electrochemical system that can selectively extract lithium ions from complex brine chemistries, unlocking production of environmentally friendly lithium from domestic resource classes.

Shihong Lin, professor of civil and environmental engineering, chemical and biomolecular engineering; Daniel Rau, VU'24, chemical engineering

Neurodiverse Technologies

An advanced virtual reality driving simulator specifically designed for teens and adults on the autism spectrum.

Nilanjan Sarkar, professor of engineering

SJC Bio

The world's first rapid-setting, load-bearing dental bone graft cement that reduces time from implant surgery to permanent crown placement from months to minutes.

Scott Guelcher, professor of chemical, biomolecular, and biomedical engineering

Sonic Therapeutics

Novel pharmaceutical agents for treating neuropsychiatric diseases.

Craig Lindsley, professor of pharmacology, biochemistry and chemistry

Telescope Healthcare

A machine learning tool to help care providers address the problem of hospital readmission.

Daniel Byrne, faculty of biomedical informatics (retired)

VigilAI

A system to monitor healthcare algorithms, specifically targeting errant model behavior and elimination of racial bias in healthcare delivery.

Peter Embi, professor of biomedical informatics

ON-CAMPUS COLLABORATION

Vanderbilt's leadership plays a crucial role in promoting innovation, creating a strong foundation for ongoing entrepreneurial success. Key partners such as Vanderbilt Health Brock Family Center for Applied Innovation, the Wond'ry Innovation Center, and Owen Graduate School of Management's Center for Entrepreneurship (C4E) provide essential resources and training, fostering interdisciplinary collaboration and innovation.



The Brock Center provides additional support of start up companies through business coaching, entrepreneur recruitment, providing internal and external collaborators, and legal support. New Ventures and Licensing from CTTC work very closely with the Brock Center on almost all VUMC related faculty startup companies.

Ken Holroyd, holder of the Brock Family Directorship for Applied Innovation and VP for Tech Transfer at VUMC



MASTER INNOVATORS DRIVING COMMERCIALIZATION IMPACT



“These faculty are renowned worldwide for not only spectacular singular successes, but also for sustained long-term impact in turning Vanderbilt research into products that prevent injuries and improve lives. These scholar-innovators inspire all of us at Vanderbilt to pursue our innovative research all the way from initial insight to world-changing outcomes.”

Bob Webster, Senior Associate Provost for Commercialization and Technology Transfer

ANTIBODIES FOR INFECTIOUS DISEASES

ROBERT CARNAHAN, PH.D.

Associate Professor, Department of Pharmacology, Vanderbilt University



Carnahan is a translational scientist and antibody engineer who specializes in rapid therapeutic development for emerging infectious diseases. As associate director of the Vanderbilt Center for Antibody Therapeutics, he has led pivotal efforts to advance antibody candidates for Zika, Marburg, hantavirus and SARS-CoV-2 in collaboration with partners including the Department of Defense and Biomedical Advanced Research and Development Authority.

His work with James Crowe (recognized as Vanderbilt Master Innovator in 2022) achieved remarkable commercial success through a licensing deal with AstraZeneca that led to Evusheld™, an antibody combination that protects against COVID-19 in immunocompromised individuals, generating more than \$100M in revenue. Carnahan's innovation portfolio includes 17 invention disclosures, 7 issued patents, and 21 licensing transactions. He also served as a CTTC Innovation Ambassador.

SYSTEMS BIOLOGY BREAKTHROUGHS

JOHN WIKSWO, PH.D.

University Distinguished Professor of Physics, Biomedical Engineering, and Molecular Physiology & Biophysics; A.B. Learned Professor of Living State Physics; Founding Director, Vanderbilt Institute for Integrative Biosystems Research and Education



A distinguished inventor, Wiksw's innovation portfolio consists of 76 invention disclosures and 47 issued patents, with licenses to companies including Kiyatec Inc. and CN Bio Innovations, a biotechnology company based in the U.K. He has received two R&D 100 Awards: in 1984 (then the IR-100 Award) for the Neuromagnetic Current Probe and in 2017 for the MultiWell MicroFormulator.

Wiksw is in the process of founding a new startup, Regemus Technologies, to license and commercialize a portfolio of technologies directed to creating automated microfluidic perfusion systems to optimize biomanufacturing or infer the dynamics of signaling and metabolism of living systems.

In addition, Dr. Wiksw established the Vanderbilt Institute for Integrative Biosystems Research and Education (VIIBRE) in 2001 to foster interdisciplinary research across biophysical sciences, bioengineering and medicine. VIIBRE has mentored more than 350 undergraduate researchers.



CENTRAL NERVOUS SYSTEM THERAPEUTICS

KAYLA J. TEMPLE, PH.D. *Senior Drug Discovery Scientist, Assistant Director of Medicinal Chemistry, Warren Center for Neuroscience Drug Discovery (WCNDD)*

Temple joined Vanderbilt's drug discovery team in 2016 after completing postdoctoral training under Craig Lindsley. Her research focuses on medicinal chemistry and drug discovery for central nervous system disorders, particularly allosteric modulators for muscarinic acetylcholine receptors and metabotropic glutamate receptors.

Temple's innovation portfolio includes 35 invention disclosures, 11 issued patents and 11 licensing transactions that have generated more than \$10 million in revenue to date. Her work exemplifies the breakthrough science driving Vanderbilt's leadership in central nervous system therapeutics.



DRUGS TO TREAT CENTRAL NERVOUS SYSTEM DISORDERS

DARREN ENGERS, PH.D. *Research Assistant Professor; Senior Director of Medicinal Chemistry, Warren Center for Neuroscience Drug Discovery (WCNDD)*

Engers is an outstanding innovator in central nervous system drug discovery who serves as group leader for multiple programs within the Warren Center, including M1 PAM, M4 PAM and various ion channels. His leadership has directly contributed to major licensing transactions and clinical trials with pharmaceutical companies including Neumora, Acadia Pharmaceuticals, and Ono Pharmaceutical Co.

As senior director of medicinal chemistry and a Warren Director Fellow, Engers supervises and mentors more than 30 medicinal chemists while maintaining an impressive innovation portfolio: 91 invention disclosures, 42 issued patents, 23 licensing transactions and tens of millions in revenue to date.



ASSISTIVE TECHNOLOGY FOR WORKPLACE SAFETY

KARL ZELIK, PH.D. *Associate Professor of Mechanical Engineering, Biomedical Engineering, and Physical Medicine & Rehabilitation*

Zelik's groundbreaking work in biomechanics and wearable assistive technology has revolutionized workplace safety through the development of back-assist exosuits. After joining Vanderbilt in 2014, he helped found the Center for Rehabilitation Engineering and Assistive Technology (CREATE) and spent years developing pioneering technology that led to the HeroWear Apex exosuit.

Since the commercial launch in 2020 of HeroWear, the startup Zelik co-founded, the company has achieved remarkable market penetration, with exosuits now deployed in more than 30 countries to reduce workplace injuries. Zelik's innovation portfolio includes 34 invention disclosures, four issued patents and seven licensing transactions.



INVENTOR SPOTLIGHT

Abhishek Dubey's Journey of Academic and Entrepreneurial Success

Abhishek Dubey is a leader in cyber-physical systems and artificial intelligence. He is Vanderbilt University College of Connect Computing's dynamic Associate Dean for Research, Chancellor Faculty Fellow, and Director of the SCOPE lab.

With a foundation in electrical engineering from the Indian Institute of Technology (IIT) and doctoral training from Vanderbilt University Institute for Software Integrated Systems, Dubey develops advanced AI-driven frameworks and decision-making methods to improve transportation operations, public safety response, and infrastructure resilience.

A visionary academic leader, Dubey's work has been funded by prestigious entities like NSF, NASA, DOE, ARPA-E, AFRL, DARPA, Siemens, Cisco, and IBM.

As the co-founder of MobiusAI, Dubey remains committed to bridging academia and industry, ensuring that his innovative AI research translates into tangible societal advancements.

FORGING A PATH IN ENGINEERING EXCELLENCE

From a young age, Dubey was fascinated by complex problem-solving, leading him to pursue electrical engineering at the prestigious Indian Institute of Technology (IIT) Banaras Hindu University. After graduating, he joined IBM's consulting division, where he impacted global business and research collaborations.

Seeking greater challenges, he moved to the United States to pursue his M.S. in Electrical Engineering from Vanderbilt University, where he subsequently completed his Ph.D.

"As an electrical engineer, my goal was to challenge software infrastructures and control complex machines. I chose Vanderbilt for its renowned Institute for Software Integrated Systems, a top US institution then and still highly regarded today."

Dubey fully embraced Vanderbilt's ethos of conducting impactful, practical research under the mentorship of Gabor Karsai, VUSE Distinguished Professor of Computer Science. He states, "I was encouraged not only to excel in academic journals and publications, but also to tackle real-world problems and make a tangible impact in society."



COMMUNITY-CENTRIC AI RESEARCH

Transitioning into a faculty role, Dubey leaned on his academic ecosystem, highlighting the vital contributions of his team of graduate students and research scientists. Dubey's work centers on long-term partnerships with public agencies and local communities. His approach is to transform collaboration at local and state levels, connecting academia, industry, and government.

Under his leadership, Vanderbilt is actively partnering with WeGo Public Transit and Metro Nashville Government to integrate AI decision systems into Nashville's transportation, enhancing reliability, efficiency, and emergency response. This project was bolstered by Nashville's role in the National Institute of Standards and Technology's Global Cities Team Challenge, linking NSF, DOE, and FTA-funded research with city partners, and laying the groundwork for Mobius AI's neuro-symbolic systems in complex urban settings.

At the state level, Dubey worked with Tennessee's Departments of Transportation and Safety to predict crash risks and aid emergency response statewide. Currently, his team partners with Williamson County Emergency Management and TN-Go to modernize school bus systems with AI routing, scheduling, and safety tools improving student safety and coordination.



"Mobius' AI models are trained for safe, quick decision-making, supporting dynamic interactions and timely alerts. This training is central to our mission of redefining on-demand mobility with user-friendly software."

STARTUP SPOTLIGHT

Dubey's startup, MobiusAI, emerged from his research on applying AI to practical transit optimization, gaining traction through the 2014 Smart America government initiative in Nashville. This success led to his tenure-track position at Vanderbilt and collaborations with organizations like Chattanooga's CARTA.

Guided by the Vanderbilt Center for Technology Transfer and Commercialization, Dubey translated foundational research in AI-driven transit optimization into a broader commercial vision that became Mobius AI, Vanderbilt's first AI-focused startup.

Mobius AI is a neuro-symbolic artificial intelligence company that combines data-driven machine learning with symbolic reasoning and formal methods to deliver trustworthy, interpretable, and decision-aware AI systems.

Building on Dubey's work in infrastructure cyber-physical systems, the company develops AI platforms capable of reasoning over complex operational constraints while continuously learning from real-world data—enabling applications in transportation, infrastructure resilience, and safety-critical systems.

With support from the Vanderbilt Owen Graduate School of Management, the research evolved into a structured venture and started working with clients in the Non-emergency Medical Transport Area. To date company has raised 800K in pre-seed rounds.

LEARN MORE: MOBIUSAI.TECH



The screenshot shows a software interface for trip management. At the top, there are tabs for 'Scheduling', 'Map', and 'Shifts'. Below this, a date selector shows 'Today' and 'Friday, March 6, 2026'. A sidebar on the left displays 'Trips (50 / 800)' and a search bar for 'Search for rider name'. Below the search bar, there are buttons for 'Trips' and 'Alerts 197'. A profile card for 'Daniel Smith' is visible, with details: 'Atlanta - SafeRide', 'Unassigned', 'Pickup 9:55 PM', and '1022 Greenwood Avenue Northeast, Atlanta'. The main area shows a map of the United States with various cities marked, including Edmonton, Saskatoon, Regina, Winnipeg, Fargo, Duluth, Billings, Minneapolis, and Montreal. At the bottom right, there are buttons for 'Assign' and 'View Shift'.

INDUSTRY PARTNERSHIPS

Through Vanderbilt's Institute for Software Integrated Systems, Dubey partnered with Nissan's Advanced Technology Center in AI-driven sustainable energy research. The project integrated real fleet data with Vanderbilt's expertise in AI, multi-agent systems, and neuro-symbolic control, and the research has progressed from simulation platforms to human-centered negotiation mechanisms, achieving cost savings for both building operators and EV users.

STRATEGIC LEADERSHIP IN TECHNOLOGICAL ADVANCEMENTS

As National Science Foundation (NSF) Program Director, Dubey expanded his national influence by leading the Cyber-Physical Systems and Smart and Connected Communities programs. He promoted sustainable tech solutions, enhancing research strategies by integrating AI with the physical world. This approach influenced key partnerships at Vanderbilt, including expanding the relationship with Nissan Motor Corporation.

"Serving at the NSF was a significant milestone in my career, and I would have loved to continue, especially during this challenging time for the organization. However, I had to step away to focus on my responsibilities at Vanderbilt, where I lead an outstanding group of talented researchers."

COLLABORATING WITH HUMILITY AND IMPACT

Dubey combines academia and industry collaborations to showcase the power of engineering and AI in addressing local and national challenges. With over 300 publications and more than 5900 citations, his work enabled by over \$60M in grants and contracts, highlighting Vanderbilt's impact-driven innovation. Dubey also acknowledges leaders like Dan Work, Jonathan Sprinkle, Gabor Karsai, Ayan Mukhopadhyay and the students and researchers from Scopelab, for their contributions to transportation solutions.

He advises colleagues to embrace collaboration and to humbly acknowledge knowledge gaps:

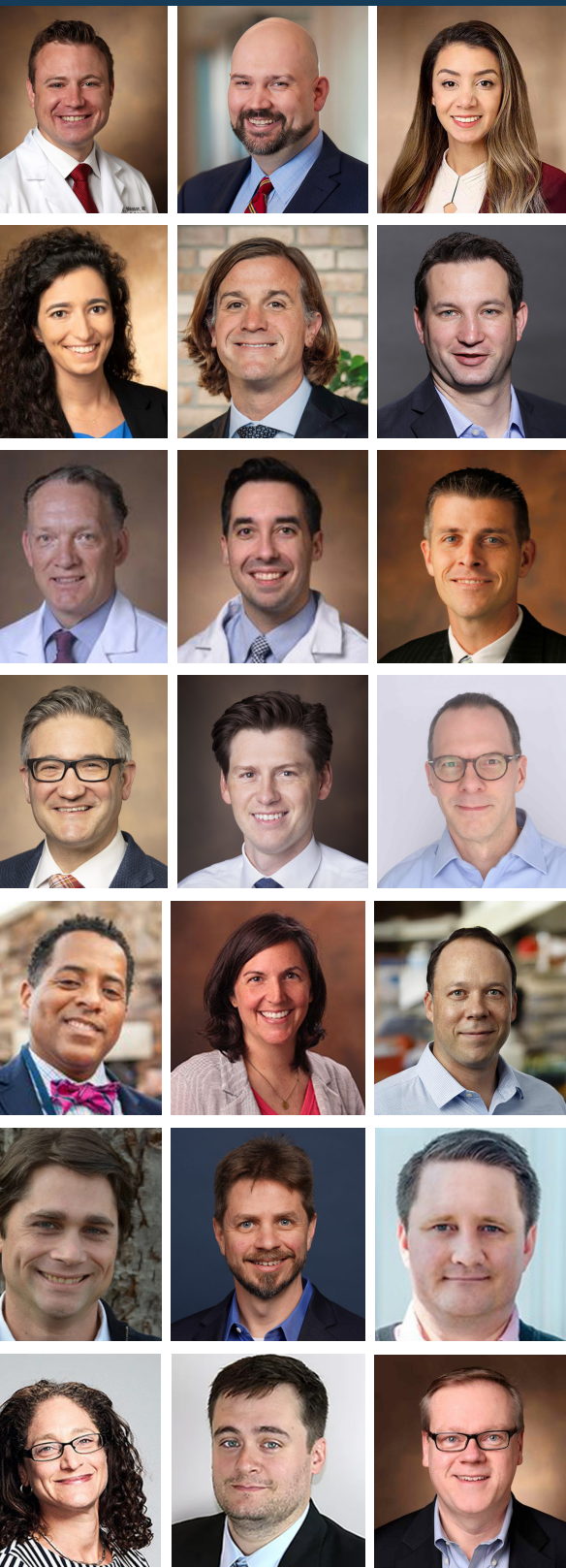
"In business, it's crucial to listen and admit what you don't know, despite being an expert in your field. Experience boosts confidence, but initially, a supportive team is necessary, and I was fortunate to have that backing. Anyone looking to build anything should clearly articulate their vision and then seek the right support."

Furthermore, Dubey gratefully acknowledges and credits the unwavering support of his family—including his late mother, his in-laws, his sister, and especially his wife and children—for standing beside him throughout his career and innovation-driven pursuits. Their patience, encouragement, and quiet sacrifices have been the foundation that enabled his professional journey.

Bridging academic expertise with an entrepreneurial vision, Dubey's journey exemplifies the pathway for aspiring innovators. His story demonstrates how Vanderbilt supports impactful advancements locally and nationally through a culture of innovative excellence.



FROM LAB TO IMPACT: HOW FACULTY HELP FACULTY COMMERCIALIZE RESEARCH DISCOVERIES



BY PORSHA THOMAS

Navigating the journey from research to real-world impact can be challenging. Luckily for Vanderbilt faculty, there's a network of Innovation Ambassadors to guide them.

Developed by the Center for Technology Transfer and Commercialization, the Innovation Ambassadors program trains ambassadors—faculty volunteers from departments across campus—to be peer resources for colleagues who are exploring pathways to commercialization.

Whether an investigator is curious about patent protection, research funding opportunities or startup formation, they can turn to discipline-specific ambassadors to help them tap into the expertise available right here at Vanderbilt.

"The Innovation Ambassadors provide a readily available source of trusted, peer-to-peer advice to faculty, helping them find the optimum pathway for achieving impact from their research results. Last year, CTTC received 231 new invention disclosures representing 519 inventors, nearly 200 of whom were first-time disclosers. The Innovation Ambassadors program aims to keep that momentum going by ensuring more faculty know where to start." Alan Bentley, Assistant Vice Chancellor for Technology Transfer and IP Development

ABOUT THE INNOVATION AMBASSADORS PROGRAM

Led by Philip Swaney and Carlos Detrés-Román, Vanderbilt's Innovation Ambassadors program has served as a model for peer-led initiatives at institutions including Columbia University, the University of Arizona, the University of Michigan, Baylor College of Medicine and the University of Utah. Vanderbilt now leads a quarterly working group for nearly a dozen institutions that have launched or are exploring adopting the model.

Part of the program's success can be attributed to the continuous feedback loop created by its peer-to-peer framework. As ambassadors regularly report departmental needs and concerns to CTTC, process refinements can happen swiftly. The result is a trusted, faculty-centric approach to moving discoveries beyond the lab.





**Jo Ellen Holt,
D.N.P., A.P.R.N.**

Jo Ellen Holt is director of the skills and simulation lab at the Vanderbilt School of Nursing. She is also an Innovation Ambassador.

Holt's decision to join the interdisciplinary cohort—whose expertise spans engineering, medicine, science, education and nursing and is tailored to the commercialization challenges of each discipline—was motivated by her interest in transforming care delivery.

“As a nurse initially trained in chemical engineering, I understand how innovation works; I also understand how invisible nursing expertise can be in these spaces,” Holt said.

“I came here to become fluent in innovation—not just for myself, but to open doors for our entire profession. Now colleagues have the tools to pursue solutions they may not have known were possible or scalable, and that promote recognizable ownership within the nursing profession.”

Holt draws on her Ambassador training to connect her School of Nursing colleagues with CTTC. Her efforts have yielded patent filings for groundbreaking medical devices (including an incentive spirometer adaptor for tracheostomy patients) and a partnership with the Metro Nashville Public Health Department to use new simulation techniques to train community members in emergency overdose response.



Alex Waterson, Ph.D.

In his work as a research professor of pharmacology and chemistry at the Vanderbilt Institute of Chemical Biology, Alex Waterson regularly encounters research in its earliest stages. His vantage point positions him well as a faculty ambassador, offering commercialization guidance as projects take shape.

“I wind up seeing early phases of a lot of different projects, from a lot of investigators,” Waterson said.

“Knowing what the possible pathways to commercialization are, and what resources are out there, helps us steer that work into a potentially successful opportunity for them later on.”

Waterson stressed the importance of faculty engaging often and early with the CTTC and its initiatives.

“There’s really useful information and opportunities in the informational emails that CTTC sends around,” Waterson said. “Some investigators may think their work is not well-suited for commercialization, but it’s sometimes hard to predict what might resonate externally. So open those emails. Ask some questions. You might have something that fits.”

In 2024, Waterson was named a Master Innovator for his contributions to medicinal chemistry, which have been instrumental in the discovery of new cancer therapeutics.

THE INNOVATION CATALYST FUND DRIVING SOCIETAL IMPACT

The Innovation Catalyst Fund has proven essential to transforming Vanderbilt's research into real-world solutions by providing key translational financial support that bridges visionary ideas and practical applications across diverse projects in fields like medical diagnostics, education, and environmental innovation.

An example is the Advancement of Neurodivergent-Aware VR Interview Simulator (NAVIS) project, led by **Nilanjan Sarkar**, professor of mechanical engineering and computer engineering. The technology, translationally advanced via Catalyst funding, is transforming human-centered innovation for neurodiversity. It offers support for neurodivergent individuals in building critical interview skills to prepare for workforce entry through immersive virtual reality technology. The work is being further commercialized through Neurodiverse Technologies.

The fund is sponsored by Chancellor Daniel Diermeier, Provost and Vice Chancellor for Academic Affairs C. Cybele Raver, and Vice Chancellor for Finance and Information Technology, Brett Sweet, to support Vanderbilt University and Vanderbilt University Medical Center researchers by providing necessary proof of concept funds, accelerating the path toward commercial viability and societal impact for initiatives with strong innovation potential.



"At Vanderbilt, we are intentional about bridging the space between discovery and impact. The Innovation Catalyst Fund provides the crucial early support that allows visionary research to advance toward and commercial viability. By investing in our faculty's most promising innovations, we are not only accelerating translation—we are amplifying the societal return on our academic mission."

Provost C. Cybele Raver

Since its inception in 2023, the Innovation Catalyst Fund has made remarkable impact on advancing innovations toward commercialization

55

projects awarded to date

\$1.8M

total funding awarded in translational research support

OF THE 22 PROJECTS REPORTING:

11

technology disclosures generated

7

licenses executed

14

startups facilitated

\$15.2M+

in follow-on funding generated, in the form of federal grants, foundation awards, and capital investments in startups





THROUGH THE INNOVATION CATALYST FUND, VANDERBILT'S FACULTY
ARE MAKING SIGNIFICANT STRIDES WITH PROMISING INNOVATIVE
PROJECTS ACROSS VARIOUS FIELDS.

At VUMC, the Image Assist project, led by faculty-entrepreneur **Michael Golinko**, provides an innovative approach to make patient imaging more precise and secure by incorporating national clinical photography guidelines and utilizing dynamic digital frames.

The startup ImageAssist, Inc. was launched because of the positive momentum the technology received through the Innovation Catalyst fund.

Within the University's Engineering department, **Joshua Caldwell**, professor of mechanical engineering, leads Sensorium Technological Labs, which couples hyperspectral imaging technology with artificial intelligence (AI) to enable applications in the semiconductor industry. Catalyst funding was instrumental in supporting the translational development of the technology licensed to Sensorium.

Moreover, Catalyst funding was pivotal in advancing the following initiatives to become new startups that will ensure personalized learning and medical treatments are more adaptable and efficient:

Amy Booth, professor of psychology and human development, is developing the REED app to improve children's language and social-emotional skills through interactive reading prompts, technology being commercialized by the startup COG Learning.

Scott Crossley, professor of psychology and human development, is enhancing employee learning through "intelligent text frameworks," or iTELL, creating adaptive training material.

In the medical domain, **Scott Guelcher**, professor of chemical and biomolecular engineering, is innovating surgical implants that dissolve according to the body's healing process, enhancing patient recovery.

FACULTY-LED EXPERTISE AND GUIDANCE

The strategic direction of the Innovation Catalyst Fund is guided by a 40-member peer review faculty committee.

These experts, representing a range of fields, conduct thorough evaluations and provide recommendations to Vanderbilt leadership.

Arts and Sciences

Jad Abumrad, Michael Bess, Leah Lowe, Ole Molvig, and Paul Stob

Bioscience & Healthcare

Justin Balko, Colin Barker, Rob Carnahan, Shabnam Eghbali, Daniel Fabbri, JoEllen Holt, Tae Hyun Hwang, Douglas Kojetin, Alex Langerman, Ken Lau, Taekyu Lee, John McLean, George Nicholson, Kevin Sexton, Ravi Shah, Gitanjali Srivastava, Sahar Takkouche, Alex Waterson, Matthew Weinger, Lauren Williamson, and Adam Yock

Engineering & Physical Science

Abishek Dubey, Lindsey Fox, Gabor Karsai, Yiorgos Kostoulas, Laurie Novak, Jesse Spencer-Smith, Sonya Sterba, Kenny Tao, and Jim Weimer

Social Sciences

T. S. Harvey, Chris Vanags, Steven Wernke, Elizabeth Zechmeister, and J.B. Ruh

NEW VENTURES

The New Venture Development team supports startups spun-out from Vanderbilt research by assessing concepts, assisting in company formation, and building relationships with investors.

The team also manages licensing equity, serves on boards, oversees the Innovation Catalyst Fund, and leads initiatives like the Entrepreneur-in-Residence program, the Southeast Venture Showcase (SVS), Vanderbilt Venture Partners (VVP), the Entrepreneurs' Club, and the SpaceEdge Accelerator.



Vanderbilt's faculty bring a drive to innovate. By equipping them with specialized expertise and strategic network connections, we help transform breakthrough ideas into human health solutions while still allowing faculty to focus on their research. Scalable collaborations are the engine that turns great ideas into meaningful outcomes."



Jennifer A. Pietenpol, Chief Scientific and Strategy Officer
Vanderbilt University Medical Center

CONNECTING VENTURES AND INVESTORS

Launched in 2025, the Vanderbilt Venture Partners program connects Vanderbilt founders with the venture capital community. The program facilitates deeper, more meaningful interactions between faculty entrepreneurs and investors, supporting Vanderbilt innovations in getting their innovations to the market.

"The Venture Partners program is becoming a potent conduit between Vanderbilt startups and early-stage venture investors. Our efforts aim to accelerate Vanderbilt's innovation pipeline, fostering mutual value creation for faculty and investors alike."

Cam Crain, Venture Acceleration Manager

In the past three years, Vanderbilt has launched 29 technology-based startups, including 16 in the fiscal year 2025 alone. VVP provides critical support for these ventures, helping them secure the necessary capital and navigate their growth phases.



STARTUP SPOTLIGHT

Brim Analytics Receives ARPHA-H Funding Extension

In FY25, Brim Analytics was founded from the Democratized AI-Guided Chart Abstraction Platform (DAGCAP) project. Led by Dan Fabbri, associate professor of biomedical informatics, Brim Analytics is an AI-guided platform for clinical data abstraction that helps healthcare teams transform unstructured clinical notes into structured, trustworthy data.

In 2025, Vanderbilt University Medical Center researchers secured a funding extension from the Advanced Research Projects Agency for Health (ARPA-H), extending its financing to 2027 with an additional \$2 million, bringing the total funding to nearly \$4 million.

This extension aims to enhance the use of DAGCAP in clinical trial pre-screening, clinical workflows, registry abstraction, and retrospective research across various care settings, supporting Brim Analytics' rapid commercial growth and widespread adoption.

LEARN MORE: [BRIMANALYTICS.COM](https://brimanalytics.com)

STARTUP SPOTLIGHTS

Virtuoso Surgical Inc. Gains FDA Breakthrough Device Designation

Virtuoso Surgical, Inc., a Vanderbilt-founded company developing new robotic tools for endoscopic surgery, has received FDA Breakthrough Device Designation for its Surgical Robotic System for bladder lesion removal.

The breakthrough technology features needle-sized robotic arms that significantly enhance precision in minimally invasive endoscopic procedures. The milestone brings Vanderbilt researchers one step closer to advancing bladder cancer diagnosis and treatment of related bladder lesions.

The technology was developed at the Vanderbilt Institute for Surgery and Engineering by Robert Webster, Richard A. Schroeder professor of mechanical engineering, Duke Herrell, director of robotics at VUMC and professor of urology, and school of engineering alum Richard Hendrick, Ph.D'17.

LEARN MORE: VIRTUOSOSURGICAL.NET



Sensorium Technological Laboratories Building Momentum

Developed by innovation from Joshua Caldwell, professor of mechanical, electrical and computer engineering, Sensorium couples hyperspectral imaging technology with artificial intelligence (AI) to enable applications in the semiconductor industry.

Sensorium's patented machine learning technology came out of a decade of academic research in mid-infrared nanophotonics, which allows them to design and realize metamaterials with tailored optical response in a broad spectral range.

Sensorium has successfully closed \$4.2M in venture capital funding and their first product line, currently under development and customer testing, are low-footprint high-performances gas detectors for use in industrial monitoring.

LEARN MORE: SENSORIUMTL.COM



VANDERBILT PORTFOLIO COMPANIES

Through the Venture Studio, the CTTC provides comprehensive support services to Vanderbilt-affiliated startups, including business model development and access to funding and talent. With over 40 potential startups in development, the Venture Studio plays a critical role in moving projects from concept to market.



Scan to view
Vanderbilt startups

STARTUP SPOTLIGHT

REVOLUTIONIZING PARKINSON'S RESEARCH



KIFA THERAPEUTICS

Dr. Craig Lindsley, Executive Director of the Warren Center for Neuroscience Drug Discovery (WCNDD) and Dr. Christopher James, CEO and Founder of Kifa Therapeutics, have partnered to develop innovative treatments for Parkinson's disease.

Under the guidance of Lindsley, Kifa's Scientific Founder, the collaboration focuses on advancing highly selective CNS-kinase inhibitors.

The partnership began when James approached Vanderbilt's Center for Technology Transfer and Commercialization (CTTC) with an interest in licensing novel therapies for neurological conditions through his startup, Kifa Therapeutics.

After graduating from Yale School of Medicine, James trained in neurosurgery and brings two decades of experience split between Wall Street as a senior biotech equity research analyst and operating roles in biotechnology.

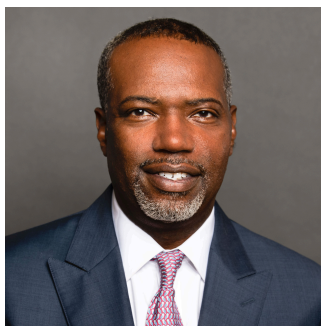
Through the CTTC process, he recognized the potential to partner with Dr. Craig Lindsley and the Warren Center's LRRK2 inhibitors for Parkinson's disease—a program supported by the Michael J. Fox Foundation through the LITE Consortium.

Kifa Therapeutics is actively engaged within Tennessee's biotech ecosystem, participating in incubators and pitch events such as LaunchTN's Scipreneur Challenge and the LSTCON Pitch Competition, where they secured first place. In response to investor feedback and aligning with its mission, Kifa diversified its approach to Parkinson's treatment, evolving into a platform developing kinase inhibitors for neurological diseases.

Through an Exclusive Option Agreement with Vanderbilt, the team expanded its focus to include ROCK2 inhibitors to address wider implications of Parkinson's such as mitochondrial dysfunction.

As the team nears its \$7.5 million seed round goal, they are poised to revolutionize Parkinson's treatment by progressing from symptomatic relief to disease modification. Moreover, Kifa is preparing for upcoming investor gatherings like the 2026 Southeast Venture Showcase and the annual JP Morgan Healthcare Conference.

Kifa Therapeutics and Vanderbilt's partnership exemplify how university-startup partnerships can help translate research into viable commercial therapies.



Christopher James
Founder & CEO, Kifa Therapeutics



"Kifa is advancing the best-in-class mutant-selective LRRK2 kinase inhibitors that will provide the optimal therapeutic window for efficacy and safety. Not only will Kifa be addressing symptoms, but also the approach can be both L-DOPA sparing and disease modifying."

Craig Lindsley

Scientific Founder, Kifa Therapeutics
Executive Director, Warren Center for Neuroscience Drug Discovery at Vanderbilt University

SOUTHEAST VENTURE SHOWCASE HIGHLIGHTS INNOVATION ACROSS THE REGION

Vanderbilt University and its Center for Technology Transfer and Commercialization hosted the inaugural Southeast Venture Showcase April 21–23, 2025 at the W Nashville hotel. This exclusive event was a first-of-its kind collaboration among top research universities and federal laboratories across the Southeast to highlight their most promising new technology-based ventures.

Through startup company presentations, investor panels and networking opportunities, SVS connected early-stage startup companies with national venture investors, creating new funding opportunities and helping accelerate the path from research to real-world impact.

“With assets like Vanderbilt University, the University of Tennessee and Oak Ridge National Laboratory in our backyard, Tennessee is primed to become an epicenter for innovation, R&D and technology,” Tennessee Economic and Community Development Commissioner Stuart C. McWhorter said during a luncheon keynote address. “We are making strategic and historic investments in this sector now to better connect the state’s talented and robust entrepreneurial and startup ecosystem with our industry partners to ensure that Tennessee is the place where companies design, engineer and innovate in the future.”



REGIONAL COLLABORATION

In preparing for the Southeast Venture Showcase, the Vanderbilt CTTC led a consortium of 21 participating institutions across Tennessee, Arkansas, Oklahoma, Texas, Louisiana, Mississippi, Alabama, Georgia, Florida, South Carolina, North Carolina and Kentucky to plan and organize this uniquely southeastern showcase.

By facilitating the launch of startup companies in their local ecosystems based on the cutting-edge innovations from their research laboratories, these universities play a critical role in local economic development while accelerating the delivery of life-changing ideas to communities in need.



PARTICIPATING STARTUPS

SVS showcased 45 venture-ready startup companies selected from the 21 participating universities and national labs throughout the Southeast. These startups were chosen through a competitive selection process led by more than 75 serial entrepreneurs, investors and technology experts. The new ventures spanned diverse technology sectors, including advanced materials, AI, diagnostics, medical devices, mobility, robotics, software, sustainability/clean tech and therapeutics.



Stephen Miller
Executive
Director for New
Venture
Development



The southeastern United States is a rising star in the worldwide innovation community, and it was a privilege to host this amazing group of innovators and entrepreneurs in Nashville. Startups seeking over \$170 million in investment were introduced to investors with over \$40.6 billion in capital under management over three days. This is the way to catalyze innovation: with bold new initiatives that accelerate the commercialization of great technologies by connecting them to investors with the vision and foresight to make it happen.”

Note: This story was adapted from an article in Vanderbilt MyVU.



SVS will return to Nashville: April 20–21, 2026

With a huge increase in applications to participate, SVS 2026 is convening twenty-five top southeastern universities and Oak Ridge National Labs and will feature 40+ academic-affiliated startup companies seeking more than \$200M in investment capital, from healthcare, biotechnology, renewable energy, advanced materials and engineering sectors.

The Vanderbilt startups selected to participate:

- SkyNano
- Vasowatch, Inc.
- Image Assist, Inc.
- COG Learning, Inc.
- Kifa Therapeutics, Inc.
- Mobius AI, Inc.
- Neurodiverse Technologies, Inc.

INDUSTRY COLLABORATIONS

The Industry Collaborations team connects corporate partners with Vanderbilt's research capabilities to enhance R&D efforts. The team assesses each partner's technology needs and strategically matches them with Vanderbilt's research strengths across the university and medical center, facilitating efficient collaborations across industries, from automotive to pharmaceuticals to defense tech. For faculty, the team eases administrative burdens and simplifies partnership processes, enabling sharper focus on scientific innovation. By nurturing robust corporate relationships and discovering new strategic alliances, the team forges partnerships that unite innovative minds and drive breakthrough discoveries.

"Collaborations with industry partners unlock the true potential of the critical work our researchers do every day, which is to address societal issues and help solve the most intractable problems. These relationships are bidirectional and require diligence, attention, and trust. Our team provides companies and researchers support in creating, maintaining and growing those relationships to maximize value for all."
Chris Rowe, Executive Director of Industry Collaborations



NISSHA MEDICAL TECHNOLOGIES TO MOVE GLOBAL ENGINEERING AND INNOVATION CENTER TO VANDERBILT'S NASHVILLE CAMPUS



Chancellor Daniel Diermeier, Mayor Freddie O'Connell, Deputy Governor and Commissioner for Economic and Community Development Stuart McWhorter and former Nissha CEO Sam Heleba at the announcement regarding Nissha Medical's research and development center for excellence moving into a space on Vanderbilt's campus. Photo: Harrison McClary/Vanderbilt University

Nissha Medical Technologies, the medical devices business unit of Japan's Nissha Co. Ltd, will occupy space on Vanderbilt's campus, investing \$4.5 million in the region. The partnership builds on an existing relationship with EndoTheia, a Vanderbilt-born startup founded by mechanical engineering professor Bob Webster.

Nissha Medical Technologies' decision to relocate its Engineering Center of Excellence to Vanderbilt is a validation of the university's translational research capabilities. The Center of Excellence will include incubator space, specialized labs, and EndoTheia's new headquarters—creating an ecosystem where ideas can mature rapidly with industry guidance and investment.

*Hosting Nissha Medical Technologies at the former site of our Stadium Club on West End Avenue will give our faculty and students extraordinary new opportunities to work with a leader in advancing medical devices—a strategic research priority for Vanderbilt and our region. This partnership also shows what is possible when companies, governments and universities engage in what we at Vanderbilt call radical collaboration—working together in common purpose across sectors and areas of expertise." **Vanderbilt Chancellor Daniel Diermeier***

Note: This story was adapted from an article in Vanderbilt MyVU.



FACULTY-LED INDUSTRY PARTNERSHIP

A \$1 million grant from Eli Lilly is funding a two-year project at Vanderbilt University Medical Center that tackles a critical gap in obesity treatment.

Led by You Chen, PhD, and Gitanjali Srivastava, MD, the research team is leveraging AI technologies to analyze health records and patient surveys to understand why individuals discontinue obesity treatments—insights that could reshape care delivery for millions, exemplifying the power of partnering with industry to create real-world solutions.

The Vanderbilt Industry Collaborations team worked with VUMC teams and drove this process through a relationship-first approach that achieves mutually beneficial outcomes. The team’s strategic engagement with Lilly has led to invitations for Vanderbilt faculty to participate in Lilly-led initiatives, including this AI-powered obesity care project.



Vanderbilt's Life Science Showcase returns on July 23, 2026

The event will spotlight how artificial intelligence is accelerating fundamental and translational life science research, bringing together Vanderbilt investigators, industry leaders, and innovators to collaboratively tackle complex therapeutic challenges.

A GROWING PORTFOLIO OF SPECIALIZED PROGRAMS

Vanderbilt's Industry Affiliates Programs (IAPs) transform how companies engage with university innovation—creating a strategic on-ramp for organizations seeking early access to emerging technologies and world-class expertise.

These membership-based partnerships foster a pre-competitive environment where industry leaders collaborate with Vanderbilt faculty and students before technological challenges become market imperatives.

Vanderbilt's IAP ecosystem spans disciplines critical to tomorrow's challenges. Each program offers tiered membership levels designed to match organizations of different sizes and engagement goals.

These programs cultivate relationships that often evolve into larger strategic partnerships, making IAPs an entry point to Vanderbilt's full innovation capacity.



Building on this foundation, we're launching new programs:

- LIVE Learning Innovation Incubator
- Institute of National Security
- Amplify Center for Generative AI (AGI)



Scan the QR code to explore partnering through our Industry Affiliates Program





INNOVATION HIGHLIGHTS

Vanderbilt emphasizes innovation as a central pillar of its mission, not only through groundbreaking research and entrepreneurial support on campus, but also by actively contributing to broader innovation ecosystems on a local, national, and global level.

Through partnerships like the Nashville Innovation Alliance, the university works with public, private, and academic stakeholders as the city continues its transformation into a thriving innovation hub, creating new opportunities for talent, investment, and startup growth. Complementing these efforts, Vanderbilt’s leadership in launching signature initiatives, such as the Southeast Venture Showcase and the Vanderbilt Venture Partners Program, further strengthens these connections by bringing together researchers, founders, and investors to accelerate collaborations that turn discovery into impact.

“Our region’s competitive advantage is our willingness to work together. The Nashville Innovation Alliance helps bring that to life by strengthening how our institutions and partners function as a connected system —advancing a technology-based approach to economic development that accelerates discovery and expands its impact for Nashville and beyond.”

Vanderbilt is actively expanding its innovation footprint across the nation. On the western edge of our Nashville campus, plans are underway to transform 40 acres into a vibrant, mixed-used innovation neighborhood that will house research labs, startup space, housing, retail, and public spaces; an environment designed to fuel collaboration and regional economic growth.

At the same time, Vanderbilt is extending its reach with new campuses and initiatives that connect students, faculty, and partners to centers of creativity and discovery—from an academic campus in the heart of New York City to a planned graduate—and innovation-focused campus in West Palm Beach, Florida, and a newly announced academic presence in San Francisco’s dynamic design and tech corridor.

Closer to home, Vanderbilt is partnering to launch the Institute for Quantum Innovation in Chattanooga, TN, creating a cutting-edge hub for quantum research, workforce development, corporate collaborations, and startup formation that will help position Tennessee as a leader in these next-generation technologies. Together, these efforts reflect Vanderbilt’s commitment to shaping innovation ecosystems that span local neighborhoods and global cities alike, bringing ideas to communities and driving impact far beyond campus boundaries.



Sally Parker
Associate Vice Chancellor,
Government and Community
Relations, Vanderbilt University
Interim Executive Director, Nashville
Innovation Alliance



Scan for Quantum Potential Podcast
Vanderbilt’s Next Era: Campuses,
Partnerships and the Power of Place
with Chancellor Daniel Diermeier and
Provost C. Cybele Raver

EXPANDING NATIONAL AND GLOBAL IMPACT

Vanderbilt CTTC is also focused on strengthening its role as an active and engaged partner within the broader innovation community by expanding both internal engagement across campus and external partnerships throughout the region.

Over the past year, CTTC has created new opportunities for faculty and researchers to connect with local, national, and global industry leaders and investors through campus visits, while also hosting innovator-focused lunch-and-learn sessions that highlight pathways for collaboration, commercialization, and startup formation.

CTTC staff are actively participating in regional convenings and ecosystem-building efforts—including Launch Tennessee’s 3686 Entrepreneur Conference, the Civic Tech Jam hosted by the Nashville Innovation Alliance, and LSTCON organized by Life Science Tennessee—ensuring Vanderbilt remains closely connected to the entrepreneurs, investors, and civic leaders shaping the region’s innovation economy.

These engagements are complemented by growing collaborations with these and other local partners across both the public and private sectors, including the Nashville Entrepreneur Center, the Greater Nashville Private Capital Association (GNPCA), the Tennessee Department of Transportation (TDOT), and the growing number of companies who call Nashville home.

Together, these relationships reflect a broader shift: researchers, entrepreneurs, and community leaders increasingly recognize Vanderbilt as not only a source of ideas and talent, but also as a trusted connector and responsive partner that helps people identify the resources and expertise to move innovation forward across the city and the region.



Transformative technologies advance when visionary ideas, talent, and opportunity coalesce. Partnerships like the one between Launch Tennessee and Vanderbilt CTTC, alongside forums such as our entrepreneur conference 3686, strengthen connections among startup founders, investors, and researchers, enabling innovation to translate into tangible progress.

Lindsey Cox, CEO, LaunchTN





THE TEAM DRIVING INNOVATION FORWARD

The Vanderbilt CTTC team, led by Alan Bentley, includes 37 employees who manage three main revenue-generating activities: Licensing, New Venture Development, and Industry Collaborations, along with Operations, Corporate Contracts, and Medical Product Support Services supporting these efforts. The team's collaborative spirit fuels the momentum of Vanderbilt's innovation engine, driving technological and scientific advancements forward.

Throughout the year, CTTC-led initiatives like the Southeast Venture Showcase, Vanderbilt Venture Partners Program, and Entrepreneur's Club events have fostered connections among innovators, industry partners, and investors. In addition, faculty Lunch & Learns and invited talks to departments or centers have provided platforms for sharing knowledge and sparking new ideas.

The team is dedicated to lower barrier for faculty engagement, expanding innovation capacity, growing external partnerships and preparing entrepreneurs for success.

LEADING INNOVATION EFFORTS

Outside of Vanderbilt, the CTTC team are involved leaders and teachers at AUTM, the primary professional organization for this field, serving as an example to other technology transfer institutions with programs such as Innovation Ambassadors, and teaming up with other universities to execute SpaceEdge Accelerator and other impactful efforts in the region.

As CTTC continues to evolve, its focus on faculty, researchers, and students ensures that Vanderbilt's reputation for pioneering research and commercialization excellence only grows stronger.

LED BY FIELD EXPERTS

In FY25, the CTTC had 15 personnel transitions, attracting new talent to the team and growing its staff internally. The team has almost 300 years of technology transfer experience combined and serves faculty across Vanderbilt University and Vanderbilt University Medical Center.

ANCHORED DOWN

Seven CTTC staff members are Vanderbilt alumni that have returned to their alma mater to contribute expertise in their respective fields.

Chris Rowe, B.E.'96, M.Eng.'98, Ed.D.'08
Executive Director of Industry Collaborations

George Wilson, B.S.'11, M.L.I.'16, M.L.S.'26
Assistant Director of New Venture Programs

Phil Swaney, Ph.D.'16
Licensing and Strategic Initiatives Manager

Virinchi Juttukonda, B.E.'16
Senior Licensing Officer

Andrea Valladares, MMark'23
Marketing and Communications Specialist

Sandy DeWald, M.L.S.'24
Assistant Director of Industry Collaborations

Carlos Detrés-Román, Ph.D.'25
Licensing Analyst

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