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BROADENING OUR IMPACT

VIMS is creating innovative ways to enhance public understanding of our mission, forming partnerships and reaching new audiences.

VIMS Ventures

Innovation Fund supports entrepreneurs-in-the-making

A disease-resistant oyster. Biodegradable crab pot panels. An underwater robot to measure oil slicks. These are just a few of the innovative products created by people at VIMS — with significant environmental and economic benefits.

What if more of this potential could be unleashed?

That's the impetus behind VIMS' new Dean and Director's Innovation Fund, championed by longtime supporter E. Morgan Massey and established with generous start-up funding from the Joan & Morgan Massey Foundation and the Nunnally Charitable Trust.

"In my professional career, one of the things I've learned acutely is that organizations that aren't innovating and don't have a culture around innovation can't compete and can't stay relevant," says VIMS Foundation board member Anne Waleski '89, former CFO and executive vice president of Markel Corporation.

"VIMS has always been innovative, but I think doing this in a deliberate way is really important. I'm thrilled that Morgan had the foresight to set it up," says Waleski, who chairs the fund's working group. "I went into the first meeting hopeful, and came out pretty blown away," she adds.

Like VIMS' own version of "Shark Tank," the Innovation Fund provides financial backing, business coaching, and technical assistance to help faculty and student entrepreneurs develop great ideas in marine science that are commercially viable.

"VIMS is a natural for applied innovation. It's innate," says working group member Rob Quartel, chair and CEO of NTLEX, explaining that VIMS' tripartite mission

VIMS Foundation board member Anne Waleski '89 chairs the working group for the Innovation Fund, an initiative spearheaded by VIMS Foundation co-founder Morgan Massey.

gives it an advantage over purely academic institutions. "The most obvious example is what faculty have done on oysters — they virtually singlehandedly saved that industry."

Over the past year, Quartel has generously provided pro bono technical advice to inaugural co-winner Lisa Kellogg, helping her leverage her initial $6,000 award to secure a significant external grant. Kellogg became a repeat winner this year, along with her colleague Professsor Eric Hilton, curator of VIMS' Nunnally Ichthyology Collection (see story below).

Researcher Derek Loftis Ph.D. '14 received the other inaugural award for his pitch to commercialize a water-level sensor, developed as part of VIMS' nationally recognized StormSense flood-monitoring initiative.

"I went into the first meeting hopeful, and came out pretty blown away," Waleski says.

"I think the Innovation Fund is a real opportunity for VIMS to shift its profile," Waleski says. "Today, it's not table stakes, but it will be at some point in the future. If you're out on the curve, and develop it as a core competency, it can become a real differentiator."

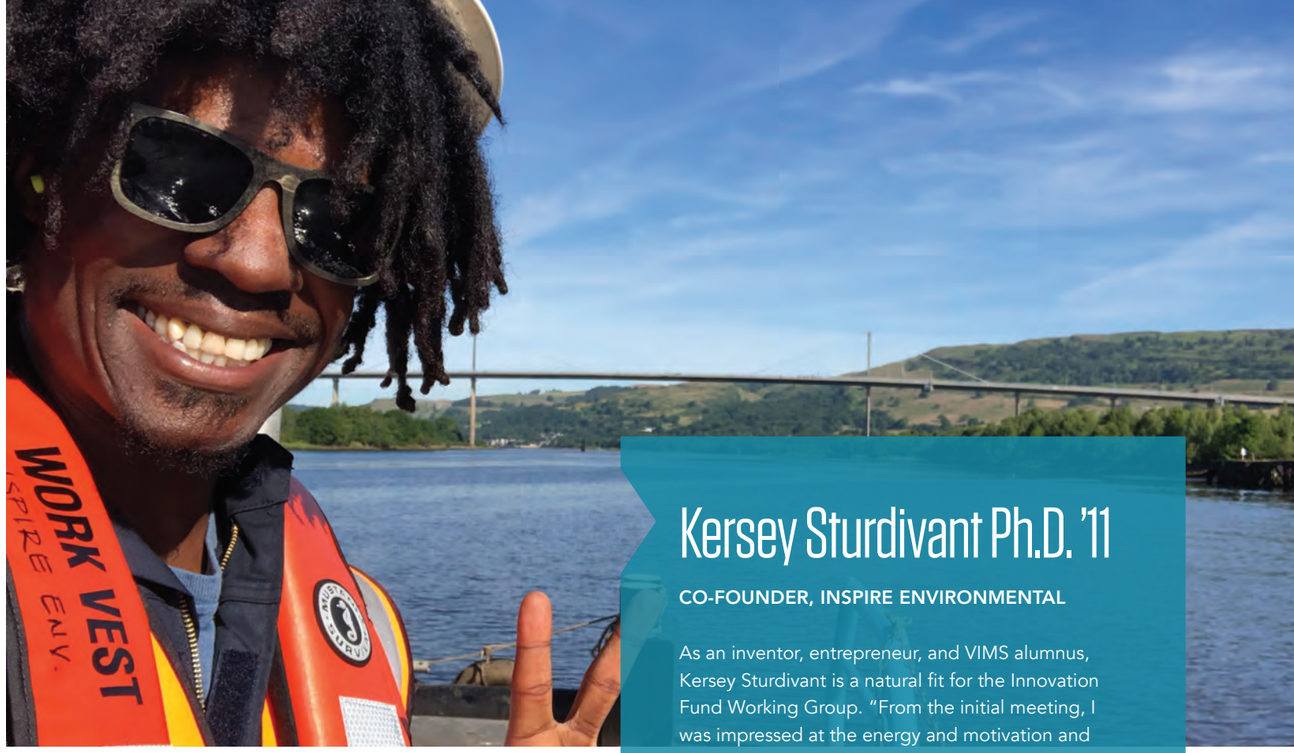
Dr. Lisa Kellogg

2019 & 2020 AWARD WINNER

When VIMS research scientist Lisa Kellogg wanted to find a better sampling method to study fish in the Chesapeake Bay's restored oysters reefs, an idea sprang to mind. "I already knew of the success of the Cornell Ornithology Lab with their Merlin Bird ID and eBird apps," she says. "I realized we could use a similar approach, turning recreational anglers into community scientists." She submitted her proposal for a fish app in the first Innovation Fund competition and won.

In addition to photos captured in the field, Kellogg is drawing on the resources of VIMS' renowned Nunnally Ichthyology Collection, with more than 500,000 fish specimens. "Lisa invited me on as a co-principal investigator for this round," says the collection's curator, Professor Eric Hilton. "My role is the verification of photos being used to train the app's artificial intelligence." In May, the two colleagues shared a 2020 Innovation Fund Award.

Kellogg has received invaluable technical assistance from working group member Rob Quartel, whose donation of time helped her meet the matching requirement for a major National Fish and Wildlife Federation grant. "Trying to meld the worlds of recreational fishermen, biologists, and software engineers — it's been an adventure," she says.



Kersey Sturdivant is a co-founder and principal scientist for INSPIRE Environmental, which uses Sediment Profile Imaging technology to assess seafloor health.

Kersey Sturdivant Ph.D. '11

CO-FOUNDER, INSPIRE ENVIRONMENTAL

As an inventor, entrepreneur, and VIMS alumnus, Kersey Sturdivant is a natural fit for the Innovation Fund Working Group. "From the initial meeting, I was impressed at the energy and motivation and ideas that were swirling around the table."

Sturdivant's career as an inventor began at VIMS, where he designed "WormCam" using Sediment Profiling Imaging technology. Today, he continues to deploy that technology as principal scientist at INSPIRE Environmental, a company he co-founded, which analyzes seafloor health for a range of clients. He's also an adjunct professor at Duke.

Sturdivant continues to develop innovative devices — creating low-cost marine hardware through Open Oceanography, a venture he founded with a Duke colleague. They began with the CTD, which measures conductivity, temperature, and depth in seawater and can cost up to $15,000. "We crowd-funded money for the startup, developing a $300 CTD that people can build using commonly available parts," he says.

He believes the Innovation Fund holds great promise. "I think it provides the opportunity to potentially attract a different kind of student, like someone interested in environmental entrepreneurship," he says. "It's a no-brainer that VIMS should have something like this, given the level of research here."

INNOVATION FUND WORKING GROUP

Anne Waleski '89, Chair
Former Executive VP and CFO, Markel Corporation

Michela English
Strategic Corporate and Nonprofit Advisor; Former Executive, Discovery Communications, National Geographic

Caren Merrick
Co-founder, WebMethods;
CEO, Virginia Ready Initiative

Rob Quartel
Chair and CEO, NTLEX

Kersey Sturdivant Ph.D. '11
Principal Scientist, INSPIRE Environmental

Episode 7 of the "Deeper Dive" video series features Ike Irby Ph.D., M.P.P. '17, policy advisor to Senator Kamala Harris (D-CA). Other Deeper Dive episodes include "Saving the Shoreline" and "Studying Sharks."

TAKING A DEEPER DIVE

NEW VIDEO SERIES PUTS THE FOCUS ON VIMS SCIENCE

Click on VIMS' website or tune into YouTube, and you can get an up-close-and-personal view of cutting-edge marine science in the new video series, "A Deeper Dive." Made possible through a generous gift from Jim Rogers and Anne "Bootsie" McCracken Rogers, the series takes viewers behind the scenes to learn about subjects as diverse as cytobots and plastics pollution. "Our goal is to have good science communicated in a way that results in good policy," Jim Rogers says. "I want to make sure politicians realize that there's an institution in Gloucester, Virginia, that's got a huge amount of capability, and that they should rely on that science to implement good regulatory policy. The videos are also a great way to get people interested enough to ask questions and learn more about VIMS."

EXTENDING OUR REACH

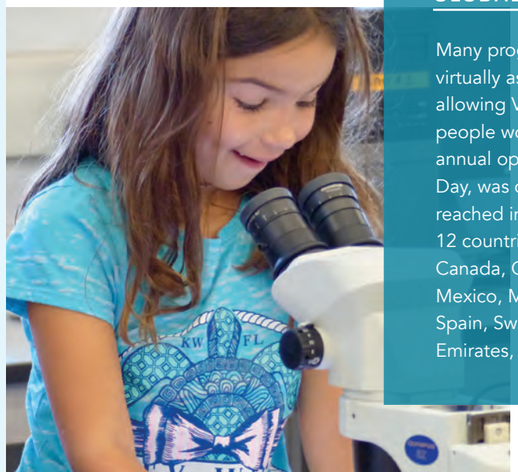
VIMS freely shares its knowledge of marine and coastal science with members of the public through diverse educational outreach programs. These programs provide direct access to our scientists and translate the research conducted at VIMS into forms accessible by students, teachers, families, community groups, and decision-makers. Through public lectures, summer camps, family-friendly Discovery Labs, and teacher and technical trainings, VIMS outreach programs empower individuals around the world to make informed decisions, protect the marine environment, and impact their coastal communities.

128,370

NUMBER OF PEOPLE REACHED WITH EDUCATIONAL OUTREACH PROGRAMS JAN 2015-JUNE 2020

"Our partnership with VIMS gives our kids bigger and better opportunities to learn about science. From the very first activity learning about different fish to visiting the campus and being able to get in the water, it was all very exciting. I must say that we have a couple future scientists on our hands!"

— JOSH GOFFIGAN, BOYS & GIRLS CLUBS OF THE VIRGINIA PENINSULA, SPEAKING ABOUT A VIMS AFTERSCHOOL PROGRAM FUNDED BY THE ARCONIC FOUNDATION



GLOBAL REACH

Many programs are delivered virtually as well as in-person, allowing VIMS to connect with people worldwide. In 2020, VIMS' annual open house, Marine Science Day, was conducted virtually and reached individuals in 41 states and 12 countries, including Australia, Canada, Germany, India, Ireland, Mexico, Montenegro, Portugal, Spain, Switzerland, the United Arab Emirates, and the United Kingdom.

16,220

NUMBER OF HOURS VIMS FACULTY, STAFF, AND STUDENTS SPENT INTERACTING FACE-TO-FACE WITH PUBLIC AUDIENCES JAN 2015-JUNE 2020

1,682

NUMBER OF PROGRAMS CONDUCTED JAN 2015-JUNE 2020

NETTING UNRESTRICTED FUNDS FOR VIMS

One Tribe One Day, William & Mary's annual day of giving, has sparked a tradition of fun and friendly rivalry at VIMS. Departmental teams, often dressed in marine-themed costumes, compete to achieve the highest rate of giving back to VIMS. In 2018, the VIMS Foundation Board added a $10,000 challenge, heightening the competition. "The Delicious Fishes" — led by staff team captains Celia Cackowski, Abigail Hils, Carol Tomlinson, and Adrienne Washington — netted the big win with an 85 percent participation rate from their team. The strong showing from all VIMS departments and donors helped secure a $15,000 university-wide Gerdelman Prize for VIMS for the highest percent increase in giving on One Tribe One Day. In recognition of their efforts, the four women were awarded the inaugural Massey Medallion, named for the Massey Foundation's long-term commitment to unrestricted giving at VIMS. "VIMS is a family," Cackowski said. "It's a group of dedicated people working together to accomplish incredible results, and I want to see its work continue."

The team of Celia Cackowski, Abigail Hils, Carol Tomlinson, and Adrienne Washington received the inaugural Massey Medallion for their One Tribe One Day success.

A SHELL SEEKER'S BEQUEST

Ask lifelong beachcomber Amelia Ann "Amy" Dick about shells and she can tell you just about anything — from the features of the oldest fossils to the habits of today's mollusk inhabitants. She's turned her passion into an enduring legacy as a nationally recognized amateur conchologist, winning awards for her scientific presentations. That same passion led Dick to establish a bequest to the VIMS Foundation to ensure the future health of our marine ecosystems. "To smell the ocean air brings me joy," she says. "Water is alive." She specifically earmarked her planned gift to help students studying water quality, so that "this love of mine will continue on after I'm gone. That is my legacy."