

News From VIMS

AMBITIOUS VIMS CAMPAIGN IMPACTS SCIENCE FOR THE BAY AND THE WORLD

The Virginia Institute of Marine Science is embarking on an ambitious campaign to raise \$35 million in concert with William & Mary's For the Bold campaign. This campaign goal is the highest ever set by VIMS and its Foundation, and funds raised will ensure that VIMS continues to be a global leader in sustainable aquaculture, marine entrepreneurship, Bay data, and scholarship.

In this special campaign issue of *Impact* you will discover stories about the work VIMS is doing in your community and the people who have been inspired to support VIMS. Join us by making a gift to the VIMS Foundation at www.vims.edu/giving or by using the enclosed envelope to support the science needed to create innovative solutions to local and global marine challenges.

Become a VIMS insider when you **subscribe to our monthly e – newsletter**, *e-Tidings*, at www.vims.edu. There you will see exclusive content



and learn about events on the VIMS campus and venues throughout the region. **Visit us on campus** for events such as tours and lectures, or simply stop by the VIMS visitor's center in Watermen's Hall to learn more about life in Chesapeake Bay. If you would like to **volunteer**, contact kattiem@ vims.edu. You can also follow us on Facebook and Twitter.

Every day, VIMS science is making a difference in the lives of our family, friends, and neighbors here and throughout the world. You have seen VIMS at

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ACUFF LEADERSHIP GIFT POSITIONS VIRGINIA FOR #1

A. Marshall Acuff, Jr. has built a reputation and a following as a financial advisor, so when he chooses to invest in something, you can't help but take notice. Recently he announced his intention to invest in the Virginia Institute of Marine Science with a \$4 million gift to advance shellfish aquaculture research and position Virginia first worldwide in sustainable shellfish aquaculture.

"It's a vote of confidence in the work VIMS does and will do for oysters," Acuff said. "The research has a huge impact, and the oyster hatchery provides an economic benefit to those who work on the water."

As a young man, Acuff worked sideby-side with his father on their farm on Virginia's Eastern Shore. When his father began farming oysters, work shifted to the water. "It was fun to be out on the water," Acuff recalled, attributing his strong back to years of shoveling shells, creating reefs, culling oysters by hand, and tonging in deeper water. He learned the value of hard work early on, but knew that the life of an oysterman was not for him. "I had no interest in farming," Acuff said. "There is too much uncertainty. Even the stock market is more predictable than mother nature."

Acuff became aware of oyster science when watermen on the Eastern Shore first began to see signs of oyster disease. "My father was an inquisitive person," Acuff said, "and he went out looking for answers." One of the places he sought answers was the Virginia Fisheries Laboratory, which was renamed the Virginia Institute of Marine Science in 1962, the same year Acuff graduated from William & Mary.



A. Marshall Acuff, Jr.

"Historically, VIMS is a hidden gem in terms of the resources it provides to the Commonwealth," said Acuff. "In addition to the advisory services it provides to the state, VIMS is doing real research that makes a difference

Spring 2017



"Ocean Frolic" was quilted by Georgene Huggett in honor of VIMS' 75th anniversary.

MERMAID CUP RAISES FUNDS FOR RESEARCH

The Peninsula chapter of the Associated General Contractors (AGC) of Virginia hosted the 2nd annual Mermaid Cup golf tournament Oct. 27, 2016, at the Kiln Creek Golf and Country Club in Newport News in support of the VIMS Foundation, which supports institutional needs, professors, and student fellowships, among other activities.

The event, held on a beautiful fall day, drew more than 100 golfers according to tournament organizer and longtime VIMS champion Bill Walsh of Yorktown-based Walsh Electric. "VIMS is the best weapon the Bay's ever had in bringing it back to good health," Walsh said. "If you get behind VIMS, you're really helping the science that helps the Bay."

In honor of VIMS' 75th anniversary celebration, Georgene Huggett of Poquoson, Virginia, created a quilt, "Ocean Frolic," that was on display at the tournament and now hangs in Watermen's Hall at VIMS.

Following the tournament, VIMS master's student Joseph Matt spoke on behalf of those whose activities are funded by donations to the Foundation. He delivered a "three-minute thesis" summarizing his study of mortality in commercial oysters.

VIMS and the VIMS Foundation appreciate the support of the Peninsula AGC, event staff, and the businesses and friends who supported the tournament. Events like the Mermaid Cup not only raise money in support of VIMS, they raise awareness among new audiences as well.

(Interested in hosting an event in support of VIMS? Contact Jennifer Dillon at jsdill@vims.edu.)

MARINE

ENTREPRENEURIAL TALENT FINDS A HOME AT VIMS

Through its innovative research, VIMS has led the way for marine entrepreneurship that benefits coastal economies. From its work to revitalize the clam industry on Virginia's Eastern Shore to its breeding of a tasty, diseaseresistant oyster that is available yearround. VIMS science and innovation has revolutionized and revitalized two important shellfish industries by providing local marine entrepreneurs with research & development, materials, training, and specialized support needed to make their businesses thrive. Thanks to those efforts, Virginia is now the nationwide leader in growing hard clams and is a leader in East Coast production of oysters.

Now VIMS wants to find the next great entrepreneurial project that will provide new workforce opportunities to Virginia and beyond. From previous successes we know that the key to generating success for industry is:

- · Dedicated, long-term funding for industry-oriented applied science
- · Funding flexibility that allows responsiveness to changing demands

• Access to business coaching, advice, and technical assistance

To optimize an atmosphere for entrepreneurial success, VIMS has launched the Dean and Director's Innovation Fund. Once fully endowed, this fund will encourage talented marine researchers to engage in commercially relevant work with dedicated, entrepreneurially oriented funding and technical assistance. At the same time, this work will expose VIMS' School of Marine Science students to entrepreneurship and **ENTREPRENEURSHIP** business as attractive career pathways. A Dean and Director's Innovation Fund Committee made up of philanthropic business leaders will advise the dean and director on funding and advisory

supports to maximize the fund's potential to create real-world industry impact.

Thanks to leadership gifts from the Joan and Morgan Massey Foundation

and the Nunnally Charitable Trust, the Dean and Director's Innovation Fund is off to a great start. "Visionary gifts such as those from the Massey and Nunnally families for the Innovation Fund help ensure that the entrepreneurial aspirations

of innovators will be nurtured and developed," said VIMS Dean and Director John Wells. "There is also strong potential to provide new workforce opportunities in the Commonwealth and beyond, which is exciting to VIMS and our donors.'

> Lead donor E. Morgan Massey

said, "The Virginia

Institute of Marine Science provides intellectual property that benefits the College of William & Mary and its graduates. In pursuing environmental improvements, VIMS is also discovering great commercial opportunities. The Dean and Directors Innovation Fund serves to provide the resources to achieve these parallel objectives."

News From VIMS

TECH TURNS BOTS INTO BAY KEEPERS

When Dr. Juliette Smith stepped onto the Virginia Institute of Marine Science campus in Gloucester Point as a newly minted assistant professor in 2014, she had a bold idea in mind: What if she could reduce the impact of harmful algal blooms (HABs) in Chesapeake Bay?

Since 2007, the York River has experienced an increase in HABs. Concerned local citizens, health officials, anglers, and aquaculturists want to know when is it safe to be in the water or enjoy local catch, and they look to VIMS for answers. Recent damage to the west coast seafood industry from a massive bloom of *Pseudo-nitzschia*, another toxic HAB organism, serves as a cautionary tale for Virginia and its seafood and aquaculture industries.

"There are scientists exploring why the blooms are spreading and

becoming more frequent," Dr. Smith said, "but my team has a particular interest in how HABs and associated toxins affect our ecosystem and threaten public health." She believes that

a network of Imaging FlowCytobots - automated, submersible bots that capture images and collect data of phytoplankton at a frequency and detection level that would otherwise be unattainable - is the key. Located in Chesapeake Bay and on the Eastern Shore, the cytobot network would be the basis for an early warning system with the goal of protecting human health and Virginia's growing aquaculture industry against HABs and biotoxin contamination in seafood throughout the region. The collected data would also complement research and advisory services already being conducted by other members of the VIMS HAB group, Drs. Kimberly Reece and Wolfgang Vogelbein.

When Williamsburg philanthropists Harry and Judy Wason met with the young scientist and heard her enthuse about a cytobot network that could improve quality of life in Chesapeake Bay, they quickly saw the importance and potential impact of the project.

"The Chesapeake Bay is a treasure," Harry Wason said. "Judy

and I were immediately excited about the opportunity to gain a better understanding of algal blooms and the potential of this technology to improve lives." The project did so much to stir the Wason's imagination that they agreed to contribute \$200,000 to VIMS for the purchase of the first cytobot, currently being built in New England, and to support a graduate student who will work with Dr. Smith to train the cytobot.

"All of my life I have been concerned about the environment and the impact people have on it," said

Harry Wason. Having grown up on the water, Harry saw firsthand the effects of changes in our estuaries. "First the grass was gone, then the crabs, then the work boats," Harry

noted. He knew that if the boats were gone, watermen were losing their ability to make a living.

"The cytobot will really enable VIMS to take the lead in early

SCHOLARS



Dr. Juliette Smith

detection of harmful algal blooms," Dr. Smith said. "We will be providing resource managers, industry members, health officials, and the public with an early warning system. Not only will it protect public health, it will ensure aquaculture sustainability in our region."

The Wasons are closely following the progress of VIMS' first cytobot as it undergoes construction and will be front and center

this summer when it is launched from the VIMS pier. "We hope others will be inspired to help fund additional cytobots and create a Chesapeake network," said Judy Wason.

"The Wasons have not only made this important work possible, they've given Dr. Smith and her team of staff and students the technology that will establish them on their long-term career trajectories. It's an amazing gift that will reap so many benefits for so many people in Virginia, and in states that are looking to Dr. Smith and to VIMS for leadership on how to get ahead of these blooms." said VIMS Dean and Director John Wells.

LEADERSHIP CHAMPIONS VIMS IN RICHMOND

At the end of January, the Virginia Institute of Marine Science held its first-ever Lobby Day at the Virginia General Assembly. Members of VIMS' executive team and Foundation Board met with legislators to champion VIMS



Members of the VIMS and Foundation leadership collaborate during Lobby Day.

in the state budget, while faculty, staff, and students staffed a booth to increase public awareness of VIMS.

The budget sent to Gov. Terry McAuliffe from the General Assembly called for restoration of a \$1M budget reduction that had been asked of VIMS and inclusion of money to build an Eastern Shore Laboratory Complex. The governor has until April to finalize the budget.



JOHNSENS PUT FOCUS ON VIRGINIA'S EASTERN SHORE

"I first became aware of the Virginia Institute of Marine Science because of sea scallops," noted VIMS Foundation President Steve Johnsen. With his Norfolk brokerage insuring many fishing vessels in Hampton Roads, Johnsen soon learned of the role VIMS played in saving the local fishery. "Without the work done by VIMS, there wouldn't be offshore scallops," he said.

In its more than 30-year history of scallop research, advisory service,

MAURY DINNER RETURNS THIS SPRING

Each year VIMS thanks and honors those who provide support to the Institute at an annual level of \$1,000 or greater with a dinner at Watermen's Hall on the Institute's Gloucester Point campus overlooking the scenic York River. This year, the event moves from fall to spring and will be held Friday, April 28. If you are a Maury level donor, you will be receiving an invitation soon. If you are not, there is still time to return a gift to VIMS and receive your Maury Dinner invitation. Visit www.vims. edu/giving to provide your support and to learn more about how your gift benefits marine science.



Dean and Director John Wells addresses supporters at the 2015 Maury Dinner.

and management, VIMS has been in the forefront of research that enhanced understanding of sea scallops and led to the present management process, which resulted in a profitable, sustainable sea scallop industry. Today sea scallops are an \$80 million annual economic benefit to the Commonwealth.

Johnsen's interest in VIMS' work led him to join the VIMS Council VIMS I in 2006, where he served until joining the VIMS Foundation Board in 2015. The Foundation Board promotes philanthropy to and stewards the philanthropic resources of the VIMS Foundation.

When Steve and his wife, Barbara, began considering a special gift to VIMS, their focus was clear. "We wanted to make a gift to impact the Eastern Shore," Steve Johnsen said. While the Johnsens may not be from Virginia's Eastern Shore originally, it's certainly where their hearts are. Since they bought property there in 1983, the couple have lovingly restored six homes, including their present home in Onancock, and fully embraced the community. Their gift, earmarked for the Dean and Director's Fund for the Eastern Shore, has already begun to make an impact with the order of a new work boat for VIMS' Eastern Shore Lab.

Dr. Christopher Hein, assistant professor in the Department of Physical Sciences at VIMS, will be one of the primary users of the boat and is eagerly anticipating its May delivery date. "The *Peregrination* will be a phenomenal addition to the VIMS



© J. Dreyer

VIMS Foundation Board Chair Steve Johnsen

small vessel fleet, bringing with it fully unique capabilities that will greatly expand our research program on the barrier islands of the Virginia Eastern Shore and more broadly along the U.S. East Coast over time."

The new vessel will be a highly capable and flexible work boat, allowing VIMS scientists to collect sediment cores in shallow water bays and marsh environments, notably in sites formerly too deep for them to access. It will also serve as a platform to transport equipment to remote, inaccessible barrier islands, sand bars, and marshes.

"These capabilities will allow myself and my team of graduate and undergraduate students to explore the long-term formation of these coastal systems, better understand the forces driving their evolution, and map the responses of these systems to those changes. Without the Johnsens' gift, which made purchase of the *Peregrination* possible, we would remain highly limited in the scope of our studies, and be stinted in our ability to better project the dynamics, rates of change, and overall stability of barrier island systems to future coastal change."

SHARK FISHERIES MANAGEMENT LEADS TO IMPROVING POPULATION

A new analysis of population trends among coastal sharks of the southeast United States shows that all but one of the seven species studied are increasing in abundance. The gains follow enactment of fishing regulations in the early 1990s after decades of declining shark numbers.

Scientists estimate that overfishing of sharks along the southeast U.S. coast—which began in earnest following the release of Jaws in 1975 and continued through the 1980s had reduced populations by 60-99% compared to un-fished levels. In response, NOAA's National Marine Fishery Service in 1993 enacted a management plan for shark fisheries that limited both commercial and recreational landings.

Now, says lead scientist Cassidy Peterson, a graduate student at the School of Marine Science at VIMS, "We've shown that after over two decades of management measures, coastal shark populations are finally starting to recover and reclaim their position as top predators, or regulators of their ecosystem. Our research suggests we can begin to shift away from the era of 'doom and gloom' regarding shark status in the United States."

Joining Peterson in the study, published in the latest issue of *Fish and Fisheries*, were VIMS professor Rob Latour, Carolyn Belcher of the Georgia Department of Natural Resources, Dana Bethea and William Driggers III of NOAA's Southeast Fisheries Science Center, and Bryan Frazier of the South Carolina Department of Natural Resources.

The researchers say their study based on modeling of combined data from six different scientific surveys conducted along the U.S. East Coast and in the Gulf of Mexico between 1975 and 2014—provides a more accurate and optimistic outlook than previous studies based on commercial fishery landings or surveys in a single location.

"Our study represents the most comprehensive analysis of patterns in abundance ever conducted for shark species common to our area and the Southeast coast," says Latour, who directs the longline survey at VIMS. Established in 1973, it is the world's longest running fishery independent monitoring program for sharks, skates, and rays.

By pooling and modeling data from all six surveys, the researchers were able to estimate population trends for seven of the region's most common coastal species: the largebodied sandbar, blacktip, spinner, and tiger sharks, and the smaller Atlantic sharpnose, blacknose, and bonnethead sharks.

The results of the analysis were clear, says Peterson. "All the largebodied sharks showed similar population trends, with decreasing abundance from the mid-1970s to the early 1990s, then a multi-year period of low abundance, and recent indications of recovery from past exploitation."

All but one population of small coastal sharks also increased in abundance. The exception was blacknose sharks in the Gulf of Mexico.



VIMS graduate student Cassidy Peterson and marine technician Jeff Eckert handle a sand tiger shark captured during the VIMS Longline Survey before releasing it back to the water.

COMMONWEALTH ADDS BAY DATA TO DATA.VIRGINIA.GOV

Chesapeake Bay-related data is Terr now available in the Commonwealth's with Open Data Portal: data.virginia. Scient gov. Powered by VIMS science, the data "Bay Data" resources provide information and new open data sets across a wide variety of topics, including indices of fish and crab abundance, inventories of tidal-marsh condition and health, waterquality trends, and knowledge of fish diversity and dietary preference.

"Chesapeake Bay is one of our greatest natural assets," said Governor



Bay data is now available at data.virginia.gov.

Terry McAuliffe. "We are partnering with the Virginia Institute of Marine Science to provide these valuable data so scientists, entrepreneurs, and

innovators have the opportunity to develop the next generation of tools to help us maintain and preserve this valuable ecosystem."

Dr. Mark Luckenbach, Associate Dean of Research and Advisory Services at

VIMS, added, "VIMS scientists have been collecting and

analyzing data on the Bay and its marine resources for more than 75

years. We're excited about all the new opportunities for sharing these datasets with the public so that everyone can benefit from the treasure trove of knowledge they contain."

New Bay Data will be added to the portal as it becomes available.

VIMS STUDENTS SELECTED FOR PRESTIGIOUS FELLOWSHIP IN D.C.

Three graduate students from the School of Marine Science at VIMS are currently using their science to better inform ocean-related decisionmaking in our nation's capital. Taylor Armstrong, Melissa Karp, and Julie Snock-Hurgronje recently began their yearlong placements with legislative and executive offices in Washington, D.C., as John A. Knauss Marine Policy Fellows, made possible through NOAA's National Sea Grant Program.

Named after one of the co-founders of the Sea Grant program, former NOAA administrator John A. Knauss, the Knauss Fellowship program provides a unique educational experience for graduate students interested in ocean, coastal, and Great Lakes resources and the policy decisions affecting those resources.

Armstrong, a current master's student, was placed with NOAA's Ocean Acidification Program. Karp, a recent master's graduate, was placed with the National Assessment Program of NOAA Fisheries' Office of Science and Technology. Snock-Hurgronje, another recent master's grad, was placed with the minority office of the Senate Committee on Commerce, Science, and Transportation's Subcommittee on Oceans, Atmosphere, Fisheries, & Coast Guard.



Three 2017 John A. Knauss Marine Policy Fellows are VIMS graduate students: From L to R: Taylor Armstrong, Julie Snock-Hurgronje, Melissa Karp © VIMS

Since the Knauss Fellowship was created in 1979, VIMS has placed 44 of the 90 students selected from Virginia institutes of graduate education, good for first in the Commonwealth and tied with the University of California, Santa Barbara for fourth in the nation.

Associate Dean of Academic Studies Linda Schaffner attributes the high number of program participants from VIMS to the unique learning environment provided to students. "The School of Marine Science puts a strong focus on preparing graduate students to address societal and global challenges in estuarine, coastal, and marine systems," says Schaffner. "We

VIMS welcomes community to campus in May

Each spring VIMS opens its doors wide to the community for its popular Marine Science Day. This year's event will be held Saturday, May 20, and will include activities for all ages, including educational exhibits, children's activities, lab tours, seining on the river, mini lectures, and a seafood cooking demonstration.

"We offer outreach programs all year, but Marine Science Day gives visitors a unique opportunity to see the broad spectrum of research, education, and advisory service work underway at VIMS and to talk to our scientists one-



Visitors enjoy activities at VIMS' 2016 Marine Science Day.

on-one," says VIMS Director of Outreach Susan Maples. This year's theme is Technology and Marine Science.

Visitors will learn how VIMS scientists breed oysters, survey fish populations, restore seagrasses, and help manage blue crabs, among many other highlighted programs. All Marine Science Day activities are free. Register in advance to save time at check-in: www.vims.edu/msd. recruit terrific students, strong in academics as well as communications and people skills."

Karp cited the experience of learning at VIMS as influencing her interest in policy. "My thesis project at VIMS dealt with the ecosystem services provided by oyster reefs and had both restoration and management implications," says Karp. "This further peaked my interest in policy and desire to pursue a career in the field." She said that VIMS' mandate to advise and be involved in Virginia's coastal resources creates an environment where students can participate in management discussions and be included in discussions with entities such as the Virginia Marine Resources Commission.

Echoing her classmate, Armstrong cited her opportunity to pursue a subconcentration in Marine Policy while working in the laboratory and taking higher-level chemistry classes as crucial to her development.

For Snock-Hurgronje, an earlier position with the South Carolina Department of Natural Resources sparked an interest in ocean policy and fisheries management that she continued to pursue with a dual Master's degree in Public Policy and Marine Science from W&M and VIMS.

These experiences are not unique, says Schaffner. "Our students take policy-related courses offered by School of Marine Science faculty, or take advantage of partnerships with the W&M Public Policy Program and the Law School that allow them to take formal coursework in policy and law on W&M's main campus."



NEW FELLOWSHIP SUPPORTS STUDY OF MARINE PLASTICS POLLUTION

Plastics in the environment are doubling every 10 years according to research by VIMS Professor Rob Hale in the Aquatic Health Sciences Department. That's not too surprising given that the use of plastics has increased exponentially since it began being mass produced in the 1940s and 50s. Today plastics are found in everyday items such as furniture, carpeting, electronics, cars, and containers, and plastic microbeads are even ingredients in products such as skin lotions and toothpaste. Now these



Photograph shows a green sea turtle immediately after it was freed of a cinched plastic tie around its body. The turtle's body had grown around the plastic tie. © John Chinuntdet, 2007/Marine Photobank."

plastic products, slow to degrade, are in our waters, including local waters like Chesapeake Bay, and collecting on shore and in marine life.

Filter feeders like the iconic sub Chesapeake Bay oyster, which filters The immense amounts of water in search of digestible food, are disproportionally impacted by marine plastics as they increasingly consume nutrientdevoid, indigestible microplastics. These plastics may then be passed SCHOLARS up the food chain – including to humans – where the additives and pollutants can accumulate in and cause and harm to our bodies.

As an avid advocate of the Bay and its tributaries, Peg Freeman became increasingly aware of the problems that plastics are presenting to our river environment. Following in her husband Bob's footsteps, the family decided they should contact VIMS to see if any research was being done to attack the problem. When presented with the idea of funding a student who could study and find a solution to marine plastic pollution, the Freeman family was pleased to help insure VIMS could attract the best and brightest talent. Their \$250,000 gift is the first privately funded fellowship to fully fund a student at the School of Marine Science through their entire PhD program.

The partnership between VIMS and the family's foundation creates a bridge between academic research, public interest, and effective action on plastic pollution. VIMS is currently recruiting a top student to focus on the issue, channeling the student's passion into the intensive study of this subject as part of their PhD research. The student will work alongside

Dr. Hale and partner with the outreach program at VIMS to share knowledge on marine plastic pollution with the public in order to have a wider impact on the community.

HOLARS "This research is really for

future generations," Freeman said, thinking of her grandchildren and great grandchild. "The rivers and Bay are extremely important, and this research will be very significant in taking care of them."



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VIRGINIA HIGH SCHOOL STUDENTS COMPETE IN 20TH-ANNUAL BLUE CRAB BOWL

Fifteen teams from across the Commonwealth recently faced off during the 20th-annual Blue Crab Bowl at VIMS, with powerhouse Bishop Sullivan Catholic High School from Virginia Beach taking first place for a record 10th straight year.

The Blue Crab Bowl, the Virginia regional competition of the National Ocean Science Bowl (NOSB©), brought nearly 80 top students to Gloucester Point for a day of heated tournament competition focused on the marine sciences. The teams represent high schools throughout Virginia, from Manassas in the north and Warrenton in the west to Isle of Wight in the south and Exmore on the Eastern Shore.

Students from 10 of the competing high schools also visited VIMS the day before the competition for an immersive experience in ocean science. Their visit included a tour of research labs for in-person discussions with graduate students concerning current projects, and a presentation from Associate Dean of Academic Studies Dr. Linda Schaffner, who described careers in marine science and shared advice on how to prepare.

All teams were recognized during an awards ceremony by Bowl coordinators Dr. Carol Hopper Brill from VIMS and Dr. Victoria Hill from ODU. The winning team will represent Virginia in the national competition, facing other regional champions at the NOSB finals, which take place April 20-23, in Oregon.



VIMS grad student Bruce Pfirrman shows a blue crab to Blue Crab Bowl participants in a pre-tournament tour of VIMS' research laboratories. ©C. Katella/VIMS.



2017 Blue Crab Bowl winners Bishop Sullivan Catholic High School ©C. Katella/VIMS.

Acuff leadership gift, continued from page 1

to citizens of Virginia and the world." In fact, shellfish science from VIMS underpins the Commonwealth's \$32.3 million clam industry on the Eastern Shore and is driving the recent huge growth (\$16 million) in the oyster industry.

Ultimately, Acuff hopes that his gift will inspire others. "There needs to be an early mover to get the ball rolling," he said. "I want to make sure people have access to oysters, that VIMS will become greater and more widely recognized, and that a way of life will

and that a way of life will be protected. Money raised in this campaign will provide significant support to help VIMS make that a reality." Acuff currently funds a Distinguished Professorship and the A. Marshall Acuff, Sr. Oyster Disease Research Fund, already making a difference on the VIMS campus.

While giving is an important part of leadership, Acuff acknowledges that it is only one part of three. "In leadership, you need to share your time, your talent, and your treasure," he said. As a founding and emeritus member of the VIMS Foundation, emeritus member of the VIMS Council, a former Board of Visitors rector of the College of William & Mary, along with numerous additional W&M volunteer leadership roles, Acuff has certainly shared his time and talent generously. He will continue

to do so as chair of the VIMS \ campaign.

VIMS Dean and Director John Wells said, "Marshall's leadership and his passion E for VIMS make him the

perfect chair for VIMS' most ambitious fundraising campaign to date. He has made and continues to make important contributions to VIMS, and his leadership will be integral to the success of this campaign. It is not every day that a former rector agrees to come back to chair a school's campaign, and I am grateful for Marshall's confidence in the quality, importance, and economic relevance of our work."



The Matthew Fontaine Maury Society

JOIN THE MAURY SOCIETY TODAY

Maury Society members— VIMS supporters who make donations of \$1,000 annually are honored and celebrated at VIMS events, listed in the VIMS honor roll, and receive special recognition in our annual report. To become a member of the Maury Society, visit www.vims.edu/impact, and make your gift today.





On April 10, VIMS will launch an exciting campaign to bring the bay scallop back to Virginia's seaside bays. Bay scallops were once incredibly abundant in these seaside bays until the early 1930s, when eelgrass, the habitat it needed to survive, completely disappeared by 1933. Consequently, with the disappearance of eelgrass, the bay scallops vanished shortly thereafter, and have not been seen since – until now.

Through William & Mary's crowdsourcing application, Tribefunding, everyone has an opportunity to be a part of the Bay scallop's new-found success. Professor of Marine Science at VIMS, Dr. Robert Orth, and his group have successfully restored seagrass in the waters of Virginia's Eastern Shore seaside bays, which has resulted in the world's largest, and most successful seagrass restoration program. Where no seagrass existed in 1997, Orth's efforts in reseeding these bays gave rise to almost 6,200 acres of seagrass present today. This restored seagrass habitat is absolutely essential for bay scallops to survive; young scallops live on the grass blades and adults hide under the canopy.

"As restoration of eelgrass in Chesapeake Bay and the seaside bays of Virginia's barrier island lagoon system has enjoyed so much success in the past few years, the idea of bringing back bay scallops, which were entirely dependent on the eelgrass, began to take shape in my mind," said Dr. Orth. "With seagrass beds protected and flourishing, the possibility of creating a viable bay scallop population is a very real possibility."

Monies raised from the 30-day Tribefunding effort will be used to buy thousands of bay scallop juveniles to introduce into the eelgrass. Just like the eelgrass, the funds raised here will be crucial for the bay scallops' survival and continued restoration success.

Once the campaign begins, please share information about the efforts with your friends, neighbors, and colleagues. Any gift, no matter how small, will be critical to building success for this campaign to conduct a massive seeding effort to help re-vitalize our local Bay scallop population. And who wouldn't like to be part of that?!

Join us on our Journey, continued from page 1

street fairs, called about algal blooms, brought your children to VIMS summer camps, and visited the oyster hatchery, but you may not know that VIMS scientists, students, and staff are impacting our world by:

- Collecting and synthesizing highquality Chesapeake "Bay Data" to generate new insights into the Bay and freely sharing the data with the public, schools, and decision makers.
- Supporting job creation by conducting innovation- and market-oriented research, and

inspiring the next generation of marine entrepreneurs who will benefit the environment and the economy.

- Spurring Virginia to be #1 in sustainable shellfish aquaculture by convening the top shellfish researchers in the world, supporting established clam and emerging oyster aquaculture industry, and continuing successful work to bring back critical shellfish habitat.
- Attracting the best and brightest students in marine science and

teaching them to lead as part of William & Mary's School of Marine Science.

Your support ensures this work can continue.

VIMS is grateful to the volunteer leadership piloting its campaign: Marshall Acuff (chair), Steve Johnsen and Jim Rogers (co-vice chairs), E. Morgan Massey (honorary chair), Charlie Natale ('82) (William & Mary Campaign Steering Committee representative), and Travis Massey (VIMS Foundation Development Committee chair).





VIRGINIA INSTITUTE OF MARINE SCIENCE

Gloucester Point, VA 23062 1375 Greate Road Virginia Institute of Marine Science





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Reservations required for most events. Visit www.vims.edu/events or call 804.684.7061

Saturday, May 20, 10am-3pm

VIMS Marine Science Day Open house: tours, exhibits, hands-on activities, and more.

All ages. No charge.

tribe in Virginia. Adults and 10+. No charge.

After Hours Lecture: The Pamunkey Indian Tribe Environmental issues facing the Pamunkey-the only federal

Thursday, April 27, 7pm

Chesapeake Bay and beyond. Family-friendly. No charge.

Hands-on learning; jellyfish in

Discovery Lab: Jellyfish

Tuesday, April 25, 6-8pm

June- September, select dates, 10:30am – 12pm **Summer Public Tours**

UPCOMING EVENTS

1.5-hour guided walking tour includes laboratory visit. Adults and 9+. No charge.

June-July, select Wednesdays, 1:30 - 4:30pm

Visitors Center Activity Days Hands-on activities and an upclose look at Bay animals. Familyfriendly. No charge.

Discovery Lab: Living Beaches

Learn about organisms you may find on the beach this summer.

Tuesday, June 13, 6-8pm

Family-friendly. No charge.

No charge.

Thursday, July 27, 7pm After Hours Lecture: **Fish Tagging**

vou release. Adults and 10+.

The importance of fish tagging and "do's and don'ts" for handling fish

10+. No charge.

The only fisheries collection in Virginia houses more than 300,000 specimens. Adults and

Nunnally Ichthyology **Collection at VIMS**

Thursday, June 29, 7pm

After Hours Lecture: