

2020

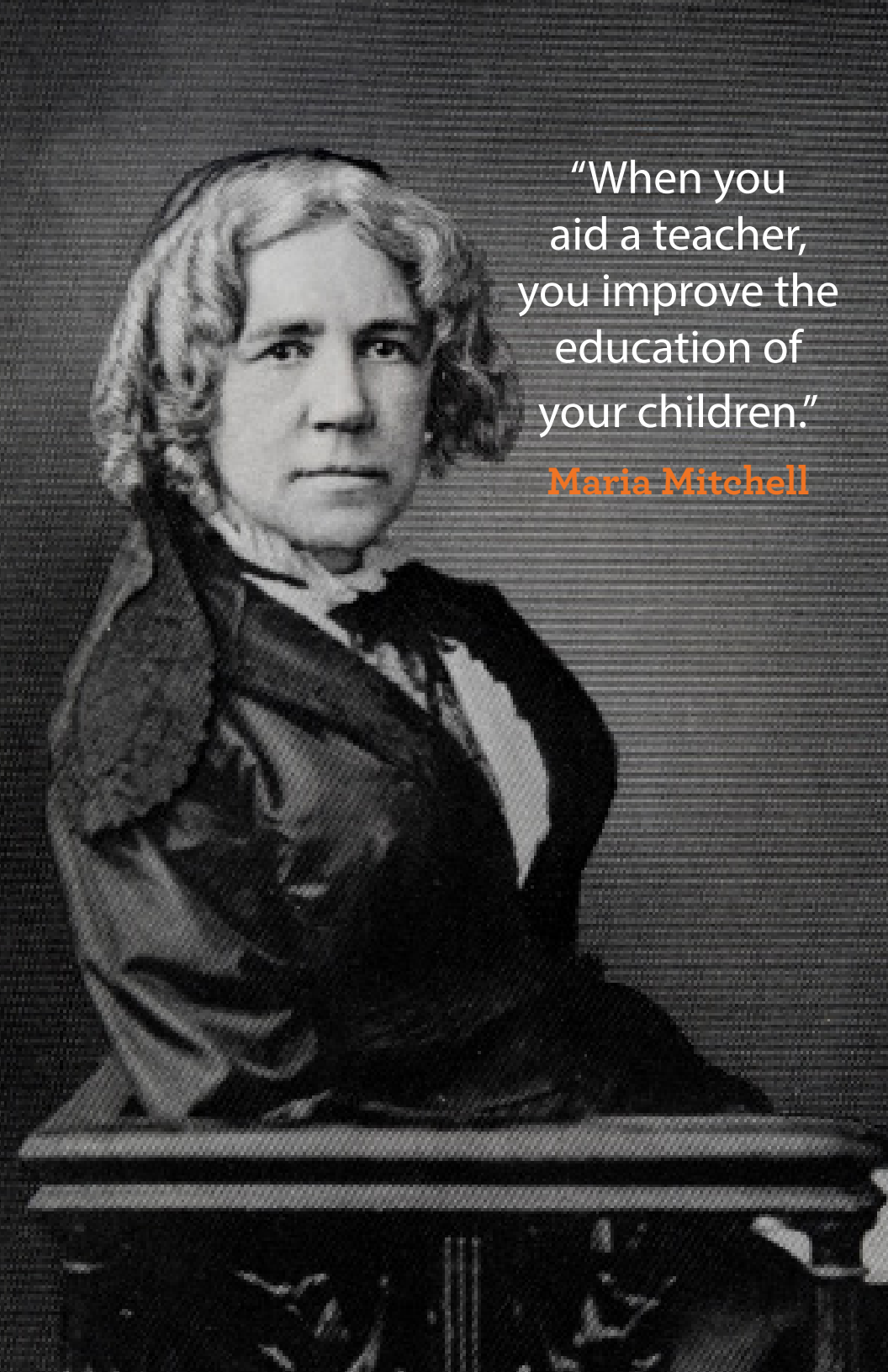
Annual Report

A close-up photograph of a person's hand holding a small, light-colored crab. The crab is positioned over a white mesh net that is partially submerged in dark, rippling water. The background is dark and out of focus, suggesting an outdoor aquatic setting.

**Maria
Mitchell**
Association

Nantucket's Science Center

A horizontal bar composed of six colored segments: blue, light blue, dark blue, orange, green, and grey.



"When you
aid a teacher,
you improve the
education of
your children."

Maria Mitchell

Mission Statement

The mission of the Nantucket Maria Mitchell Association is to create opportunities for all to develop a life-long passion for science through education, research, and first-hand exploration of the sky, land, and sea of Nantucket Island.



Table of Contents

Executive Director’s Report	2
MMA By the Numbers.....	4
Astronomy	6
Natural Science	9
Aquarium	12
Education	14
Mitchell House, Archives & Special Collections	16
Facilities	18
Development	20
Galaxy of Support	22
Donations & Gifts	30
Financial Report	31
Board, Staff, Interns, Volunteers	34
Research	36
Collaborators	38
Publications, Presentations & Awards	40



Dear Members and Friends of the Nantucket Maria Mitchell Association:

In 2020, we realized our mission in new and meaningful ways. We learned that if you stay focused on what you do well, you can get through anything. While our summer season was not full of thirty aspiring college-aged interns, 50 collaborations, or 10,000 visitors and program participants, we took hands-on experiences we offered and focused on providing them in the best way we could. Instead of in-person public programming and events, we connected people to the land, ocean, and sky through virtual experiences. And then, when we were able, we brought small, socially-distanced experiences to family groups and individuals following all the protocols required by the Commonwealth.



Jason Bridges
Executive Director

- Thanks to 187 generous supporters, our 2020 Emergency Resiliency Fund raised 23% of our annual fundraising budget;
- Led by our Astronomy Director, volunteers, and Astronomy staff, we created a way to bring the stars and planets to peoples' homes via Virtual Open Nights with new technology and added Spanish translation;
- We continued to build on collaborative and unique activities including reinvigorating the use of our collections by artists of the Artists Association of Nantucket and launching Nantucket Green Crab Week in partnership with the Nantucket Land Council;
- Our Education Department, led by the Director of Education and island collaborators, quickly found a way to bring our annual Science Festival in March to island and off-island families, increasing our reach;
- The Natural Science Department, including the Aquarium, developed unique programming that allowed small family groups to interact with the natural world, both virtually and in-person;
- The second Maria Mitchell Women of Science Symposium moved to an online platform with over 300 registrants;
- The Fifth Grade Trees in the Community program continued for its 10th year through the generosity of the Nantucket Garden Club, allowing us to buy trees for each island fifth grader to plant after learning (virtually and socially distanced in 2020) about the importance of trees;
- With support from several foundations including the Weezie Foundation, the Nantucket Golf Club Foundation, and the Community Foundation for Nantucket's Nantucket Fund, we were able to support our new and much-needed expanded educational programming for island children during the Pandemic.

As an organization, we strive to raise up the unheard and unsupported voices in science much like Maria Mitchell did in her support of education for women and all people. We

have found ways to support and amplify the position of those who are marginalized via unique initiatives, including the Maria Mitchell Women of Science Symposium which we founded in 2018 in order to support not just women and girls in STEM, but people of color and other marginalized groups. With our namesake as our inspiration, we will continue to work towards ensuring all voices are heard and that we create opportunities for all to develop a life-long passion for science.

We are listeners. We heard island schools and helped to fill their gaps in science education. We heard our partners and found unique ways to continue those collaborations within the protocols to keep everyone safe. We heard our members and friends and provided opportunities when the protocols allowed for new, re-designed and in-person activities for families, adults, and children. We listened, we supported our constituents, and we learned. We learned and supported in the spirit of our namesake, Maria Mitchell.

2020 made us stronger. It showed us where and how we could improve our outreach even beyond our shores and provided us with unique, new ways of doing that. While we were all confronted with this Pandemic, it made all of us, not just the MMA, find new and innovative ways of learning, teaching, and working.

Thank you for weathering this year with us and for continuing to support us throughout. We will continue to engage people through curiosity into the future.

Yours in science,



Jason Bridges
Interim Executive Director



Maria Mitchell Association 2020



500+

Virtual Science Speaker Series participants

300+

Registrants for our virtual Maria Mitchell Women of Science Symposium

250+

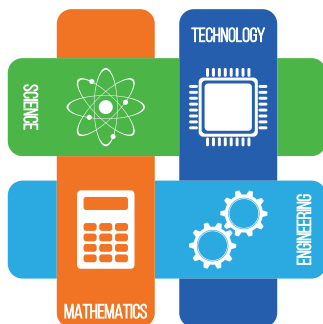
Participants in our virtual Nantucket Science Festival

10 Interns experienced our first-ever virtual internship

(6 NSF-REU, 2 Aquarium, 1 Education, and 1 Mitchell House)



Blog posts written about Maria Mitchell, Nantucket history, and the MMA



9

Months

of STEM curriculum taught to all NES Kindergarten students

Maria Mitchell Association 2020

**125
Trees**

planted through
our 5th grade
Trees in the
Community
program



62
Private or small group
programs offered in August

18

Scientists

from around the
country presented
for our weekly
Science Speaker Series



**MMA Astronomy intern
won the prestigious
Chambliss Award**

UNO

**1 Open Night presented
entirely in Spanish**





Regina Jorgenson, Ph.D.
Director of Astronomy

As was true for most of the world in 2020, Astronomy Department activities were significantly impacted by the COVID-19 Pandemic.

While we were not able to host in-person programming, we were fortunate enough to be able to adapt many programs to run via electronic media. Research programs, including the flagship National Science Foundation Research Experiences for Undergraduates (NSF-REU) summer internship, continued successfully in a virtual format. As a silver lining, the virtual Maria Mitchell Observatory (MMO) public programs attracted a national and international audience, raising awareness of the MMA far beyond the shores of Nantucket.

MMO NSF-REU Research

The NSF-REU program received 212 applications for the six available positions. After careful review and interviews of short-listed candidates, six talented young scholars were chosen:

- Devon Barros (Bridgewater State University)
- Kiana Burton (Temple University)
- Sarah Graber (Columbia University)
- Alex Granados (Wellesley College)
- Andrea Mejia (Hunter College CUNY)
- Natalia Villanueva (Harvard University)

Although we were not able to invite the

interns to Nantucket, research projects continued in much the same way as a typical summer, with communication via Zoom, email, and other electronic formats. Summer research project topics ranged from: searching for exoplanet transits around white dwarf stars and stellar flares that might affect exoplanet atmospheres to understanding black hole tidal disruption events to X-ray emission from stars and supernova remnants to using fast radio bursts to untangle the cosmic web. Each intern was paired with an individual research project and mentored by Dr. Jorgenson, Gary Walker, MMO Research Fellow Jay Chittidi, and in most cases an affiliated astronomer (AA). This summer, we were joined virtually by five AAs:

- Dr. Suvi Gezari, Space Telescope Science Institute
- Dr. JJ Hermes, Boston University
- Dr. Meredith MacGregor, University of Colorado, Boulder
- Dr. Rodolfo Montez Jr., Chandra X-Ray Center, Center for Astrophysics | Harvard & Smithsonian
- Dr. Melania Nynka, Massachusetts Institute of Technology

Notably, this summer marked the first time we welcomed back two NSF-REU alumni as AAs – both Drs. Gezari (MMO 1997) and MacGregor (MMO 2009). We began the summer with a virtual 2.5 day “Python Bootcamp” meant to provide the interns with vital computer programming skills for astronomical data analysis. In August, all six interns presented ten-minute talks on their research projects to the public via a

Zoom webinar with approximately 100 audience members.

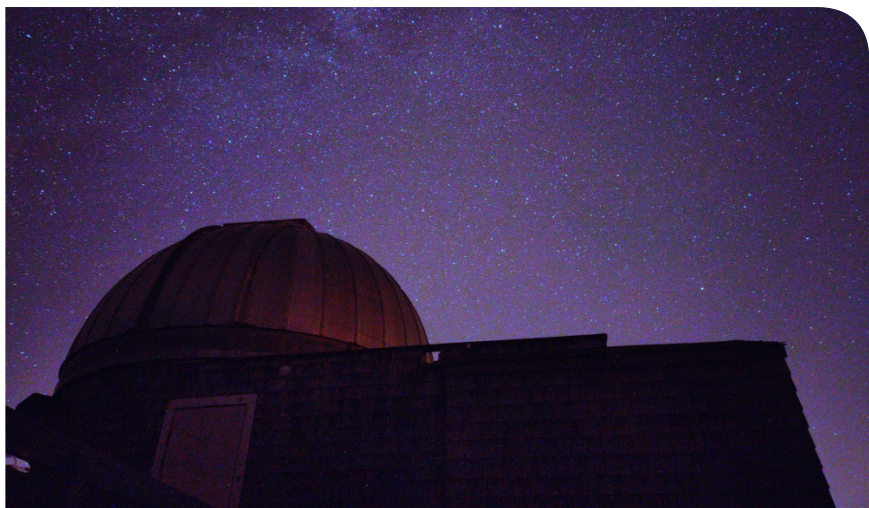
In January 2021, the interns successfully presented their research at the (virtual) 237th meeting of the American Astronomical Society (AAS). Each intern presented an interactive-poster and gave a five-minute talk on their research. We are happy to report that Kiana Burton (Temple University) was awarded the prestigious Chambliss Astronomy Achievement Award for her research presentation entitled “First Millimeter Flares Detected from Epsilon Eridani with ALMA” and completed under the guidance of AA, Dr. MacGregor.

MMO General Research

Dr. Jorgenson continued her leadership of the NSF funded Fast and Fortunate for FRB Follow-up (F⁴) collaboration, working with colleagues at U.C. Santa Cruz and around the world. MMO Research Fellow, Jay Chittidi, led research on the host galaxy of a fast radio burst (FRB), published a first author paper and contributed to several other papers, helped to mentor the NSF-REU interns, and assisted in the

general running of Observatory events. In September 2020, Chittidi began a graduate program at the University of Colorado, Boulder pursuing his Ph.D. in astrophysics. Alexandra Mannings (MMO 2019), who is also a part of the F⁴ collaboration as a graduate student at U.C. Santa Cruz, was awarded a prestigious National Science Foundation Graduate Research Fellowship. In September 2020, GeorgiaStolle-McAllister (Kenyon College, MMO 2019), returned to the MMO as the second MMO Research Fellow.

Other MMO research work continued virtually, including work with former NSF-REU intern Abby Mintz (Yale University, MMO 2019) who took a semester off from remote classes in order to focus on her research work begun during her summer at MMO. Working with Dr. Jorgenson and Dr. Marc Rafelski (Space Telescope Science Institute), Mintz began a first-author paper exploring the circumgalactic medium of galaxies using the autocorrelation of triply ionized carbon absorption towards a unique quasar pairs sample. Both Gary Walker and Dr. Jorgenson assisted in mentoring former FieldWorkTerm student,



Ariel Mora (Bennington College), with his senior thesis studying the symbiotic variable star V0694 Mon.

Virtual Events, Lectures, and Open Nights at Loines Observatory

The MMO staff presented several virtual public events and lectures via Zoom webinar. In April, Chittidi was the featured LLNF Science Pub speaker with a talk entitled "Strange Extragalactic Signals: E.T. or Something Natural?" and in June Chittidi presented on "Strange Signals and a Cosmic Conundrum: Using Fast Radio Bursts to Uncover the Universe's Hidden Matter." Dr. Jorgenson and Chittidi hosted a virtual visit with the Nantucket New School second grade in May, giving a virtual observatory tour and answering space related questions. On June 12, Chittidi, along with Molly Zegans, and Dr. Jorgenson, prepared a presentation and discussion in observance of the #ShutdownSTEM movement entitled "Why We're Shutting Down STEM: A Movement to Fight Racism in Academia."

Several virtual summer science speaker lectures were given by MMO AAs including "How To Form Habitable Planets" by Dr. MacGregor, "When the Referee Let's You Name Your Star" by Dr. Hermes, and "Satellite and Science: Building, Launching, and Using the NuSTAR X-ray Observatory" by Dr. Nynka. In September, Stolle-McAllister and Dr. Jorgenson gave a virtual, interactive presentation on the Moon in honor of "International Observe the Moon Night."

While the normal summer program of Open Nights was cancelled due to Pandemic restrictions, the MMO hosted its first ever virtual Open Night event on October 14 with nearly 100 participants via

a Zoom webinar. MMO volunteer Saoirse Ryan set up her own home telescope in order to live-stream views of the planets Mars, Saturn, and Jupiter, while Stolle-McAllister and Dr. Jorgenson discussed the planets and answered questions. On November 18, the MMO hosted the first-ever Spanish language Open Night – with thanks to Stolle-McAllister and REU interns Natalia Villanueva and Andrea Mejia.

In the fall, Dr. Jorgenson hosted a few small, outdoor-only and socially-distanced private events at the Loines Observatory, consisting of a constellation tour and astronomy Q&A.

Dr. Jorgenson continued her biweekly radio interview entitled "Looking Skyward," on current events in astronomy, with John Basile of the Cape and Islands National Public Radio station WCAI, as well writing a biweekly "Looking Skyward" column for the Nantucket Inquirer and Mirror newspaper. She continued to serve as a manuscript referee for the Monthly Notices of the Royal Astronomical Society (MNRAS) and for the Astrophysical Journal. In early December, Dr. Jorgenson served on a professional review panel for the National Science Foundation. She continued to serve on the American Astronomical Society's Committee on the Status of Women in Astronomy (CSWA).

MMO Telescope Engineer Gary Walker was active in supporting the installation of the Mittelman Telescope in New Mexico, making trips in January and February, prior to COVID-19 travel restrictions, along with Arne Henden, Alan Sliski, and Aaron Sliski. He continued regular observations with the Sierra Remote Observatory in support of the senior thesis project of Bennington College student, Ariel Mora.



Hinchman House Natural Science Museum

While we were unable to open the doors of the Natural Science Museum, Aquarium, and Research Center in 2020 due to the COVID-19 Pandemic, we were still able to offer some limited activities to the public by following protocols determined by the Commonwealth. While we were not able to have visitors filling our spaces, work still continued throughout the Pandemic.

In Fall 2020, we welcomed Dan Souza back to the MMA. After spending the summer of 2019 as an Education Intern, he returned to the MMA to serve as the Animal Care and Education Assistant. Originally from Cape Cod, Dan graduated from Brandeis University with BAs in International and Global Studies and Theatre Arts. Souza is a natural educator and gained valuable experience in the outdoors working for Mass Audubon before coming to Nantucket.

Animals continue to live with us at the Museum and with the Pandemic this was no different. People may not be aware that we do have several non-natives that live with us. Since we have found them or they have been brought to us, we cannot release them and thus they live out their lives with us. One of these is Mzee (pronounced Um-zay). In early September, we had quite the scare with Mzee, our Speke's Hingeback Tortoise. Mzee suffered with an oviduct prolapse due to an embedded egg. The surgery would be



Jack Dubinsky
Aquarium Director
& Research Center
Coordinator



Kim Botelho
Director of Education

costly, take hours and there was no guarantee she would survive. It looked like we would have to euthanize her. Luckily, we had some heroes come to her rescue. The Offshore Animal Hospital helped by providing urgent care, medicine, and x-rays. They also connected us with Dr. Charles Innis, Director of Animal Health at the New England Aquarium and one of the first veterinarians in the United States to be recognized as a reptile and amphibian specialist by the American Board of Veterinary Practitioners. He was surprised to learn Mzee has been with the MMA for over ten years after she was found roaming the streets of downtown Nantucket. He told us hingebacks were once popular in the pet trade until it was clear they didn't do well in captivity. Most did not survive, so he was eager to help save her. Kim Botelho brought her to the Aquarium's hospital where Dr. Innis and his team conducted a three-hour surgery and then provided one week of post care. All of these services for Mzee were provided free of charge. Once returned, Botelho cared for Mzee at home for a month before she was ready to return to the museum. We are happy to report

Mzee is continuing to do well.

Biological Collections, Natural Science Research, and Research Center Activities

In 2020, the COVID-19 Pandemic heavily impacted our Research Center operations and bird programs. Before the lockdown, MMA Field Ornithologist, Ginger Andrews ran three Owl Prowl programs between January 11th and March 7th. She was also able to host seven MMA Research Center Open Hours sessions between January 1st and February 14th which was in addition to three drawing sessions of collection specimens for the Artist's Association of Nantucket. To increase our digital presence during the Pandemic, Andrews provided DIY birding advice for the E-Comet and observations of interest that were posted on social media.

Despite the Pandemic, 2020 was a productive year for the MMA biological collections. In January, Collections Manager, Julia Blyth, held an informal bird

study and skin preparation workshop with six volunteers. Ten new bird skins were added to the Edith F. Andrews Ornithological Collection. Three fish were also added to the permanent collections. The year's main effort, however, involved the herbarium collections.

After years of trying to locate funding to digitize our herbarium (historic and current collection of plants), we found that an already awarded but not completely used Community Preservation Act grant from the Town of Nantucket to digitize historic documents could be applied to the herbarium because of the historic nature of the specimens. In November, Blyth began the process by purchasing and setting up new imaging equipment and taking high resolution photographs of all 5,288 of the pressed vascular plants in the Nantucket Biodiversity Collection herbarium. She also labeled these with unique barcodes and corrected the database as needed. Additionally, she photographed the 2,058 nonvascular plant specimens in the Wes Tiffney Collection. These plants will be



Dan Souza, Animal Care and Education Assistant





added to the database in 2021. The ultimate goal is for the database and images to be available through the Consortium of Northeastern Herbaria's web portal.

Further, in the area of collections, several *Sphodros* (purseweb) spider legs were shipped to researchers for a DNA phylogeny that will help clarify the relationships between the species in the *Sphodros* genus and fourteen Barn Owls in the collection contributed tissue and feather samples for future analysis.

Our Barn Owl nest box program was able to continue due to its being all outdoors but with strict COVID-19 protocols in place. Nest box surveys took place on June 10 and 11 and October 7 – 9, 2020. During both surveys, thirty-three and thirty-four nest boxes were checked respectively. The population on Nantucket seems stable and may be increasing a little. Since June 2019, the MMA has banded over 100 Barn Owls, including two from Tuckernuck. With the addition of three new boxes this Fall, and more in production for 2021, we are providing



optimum housing for the birds and at the same time having an ever-increasing impact on the mouse, rat, and rabbit populations. Fewer mice also means the owls are helping to reduce Lyme disease.

Unfortunately, we had to suspend the American Burying Beetle research due to the Pandemic. We are excited to resume working with the Roger Williams Park Zoo to reintroduce the threatened beetle species in 2021.

In October 2020, Kim Botelho, the MMA's Director of Education took the first known photograph of a Gray Treefrog, *Hyla versicolor*, on Nantucket. She, along with other island naturalists including Danielle O'Dell from the Nantucket Conservation Foundation and Blair Perkins of Shearwater Excursions, were hearing what they expected were gray treefrogs for approximately three years. Perkins even submitted calls to the MMA, but physical proof was needed to confirm its presence. Botelho's photograph was accepted by Harvard's Museum of Comparative Zoology as the first record of this species on Nantucket.



Jack Dubinsky
Aquarium Director
& Research Center
Coordinator

In 2020, the Maria Mitchell Association Aquarium continued its mission to educate the community about Nantucket's beautiful marine resources and conduct meaningful research on our

marine environment. Despite hardships related to the COVID-19 Pandemic, we were able to run limited public programming, co-host a virtual green crab education and citizen science event, stay involved with local marine monitoring, and add several tropical fish to our collection.

Aquarium

Due to the Pandemic, the Maria Mitchell Association decided not to open the Aquarium or any of the MMA properties this summer. While we were sad to not be able to welcome visitors back, we were able to complete some activities despite the serious situation the world has found itself in.

Internships and Volunteers

In 2020, a record eighty-one students applied for the competitive Aquarium Internship, three of whom were hired before we had to cancel the internship for the season. Additionally, twelve students were chosen for the summer High School Internship. Unfortunately, the High School Internship program was also suspended for the 2020 summer, as was our volunteer

program but we did find a unique way to have a few volunteers during the summer.

This year, we had three remote volunteers, two of whom had been hired for the 2020 Aquarium Internship and one of whom had been selected for the 2020 High School Internship. They helped to produce tremendous new content including marine animal fact sheets for our Aquarium staff, educational videos for our Nantucket Green Crab Week events, a green crab article for our website, and more!

Programs

Although we had a late start to programming in 2020 due to the Pandemic, we were able to run seventeen Beach Biology Field Trip programs for a total of 108 guests between July 28th and September 2nd. The trips were run with safety measures including social distancing, mandatory face coverings for staff and guests, a capacity limit of eight guests, and refraining from sharing equipment.

This year, we were unable to run our other popular programs including the Feeding Frenzy, Marine Ecology Field Trip, Night Marine Ecology Field Trip, and Plankton Pooza. Our weekly program with the Great Harbor Yacht Club's Junior Program was also cancelled due to the Pandemic.

Nantucket Green Crab Week

The MMA was proud to co-host the first Nantucket Green Crab Week! Between August 3rd and 8th, this weeklong event

offered daily programs and activities aimed at raising awareness of the invasive European Green Crab. Activities included: numerous educational videos; a live presentation with green crab researcher, James Elliot; green crab recipes; and more! As of this annual report writing, the videos and recordings have a cumulative of 2,670 views online.

We were excited to launch the Nantucket Green Crab Survey citizen science project. The survey, which records the catch per unit effort of green crabs around Nantucket, received thirty-seven submissions from locals using both bait-and-line and snorkeling techniques.

Links to 2021's Nantucket Green Crab Week events can be found on the MMA website. We are looking forward to hosting more Nantucket Green Crab Weeks in the coming years.

Live Marine Animal Collection

While the Aquarium is a unique catch-and-release aquarium, we retain a few special specimens year-round to display during the following season. This year, we were excited to continue caring for Clementine, our over twenty-year-old, seven-pound, one-in-thirty million orange lobster that has been with the Aquarium for over five years.

Every summer, the Maria Mitchell Association catches several "tropical strays," juvenile warm-water fish that get inadvertently transported to New England from the tropics in the Gulf Stream ocean current. This year, we collected several uncommon specimens, including a fringed filefish, three spot fin butterflyfishes, and three four-eye butterflyfishes. The Cape Cod Museum of Natural History graciously offered to house the 2020 tropical fish additions for the off-season. We continue to care for a

four-eye butterflyfish and two orange clownfish in a tropical aquarium. In September, we were thrilled to hire Stephanie Ryder, a veteran MMA naturalist, as our Off-Season Aquarist to take care of these live marine animals over the winter.

Monitoring and Research

While we were unable to conduct our Nantucket Eelgrass Biodiversity surveys, which ordinarily occur from June – August during the Marine Ecology Field Trip programs – and unable to participate in the Atlantic horseshoe crab spawnings surveys, which take place during the breeding season from April–June, we did have some research that continued despite the Pandemic.

We were able to continue our participation in the Marine Invader Monitoring and Information Collaborative (MIMIC) surveys for a second year. This project is managed by the Massachusetts Office of Coastal Zone Management and is designed to track the spread of marine invasive species, including tunicates, crabs, algae, and more around the New England coast. Along with the UMASS Field Station, the MMA surveys Nantucket Harbor for invasive species for MIMIC.





Hinchman House Natural Science Museum

In 2020, the Education Department was asked to help oversee the running of the Natural Science Museum. Due to COVID-19 keeping the doors of our museums closed for the season, the department focused its work on helping to update the animal exhibits with improved displays and tanks. The Natural Science and Education Department will continue to collaborate more on utilizing the space year-round for educational programming with the schools and on family and adult programming that utilizes the MMA's unique and important natural science collections.

The Giving Garden

Thanks to the generosity of the Whole Kids Foundation, we made much needed improvements to the Giving Garden. We redesigned the garden plot to provide more growing area, reinforced the base of the border fence, installed vertical growing structures for tomatoes and cucumbers, lined the garden with landscaping fabric and wood chips to reduce weeding time, and fixed the base of the garden gate. As part of this grant, we also incorporated the garden into online kindergarten programs by providing families with lessons to do at home, including "What's Inside a Seed" and "Making Seed Balls," and began building resources for summer instructors on composting, using senses to explore the garden, pollinators, flower dissections, and more. We had a very successful

growing season and were able to donate a significant amount to the Nantucket Food Pantry. As a volunteer project for the Nantucket Community Garden where the MMA Giving Garden resides, Kim Botelho, the MMA's Director of Education turned an overly shady old garden plot into a new classroom space for Discovery Campers to use.



Kim Botelho
Director of Education

School Programs

From December 2019 through June of 2020, Molly Zegans, the MMA's Education Coordinator ran a pilot program that provided monthly science enrichment classes to every kindergarten class in the Nantucket Elementary School. Once COVID-19 hit, we immediately turned these visits into online programs and also provided other lessons for





children to do at home. After demonstrating how successful the programs were, and receiving support from local teachers, we were able to secure funding from the Community Foundation for Nantucket's Nantucket Fund to begin a full year of monthly programs beginning in October 2020. Due to a new opportunity, Molly Zegans left the MMA in September, and Botelho took over and ran in-person programs when it was warm enough to be outside, switching to online programs in December.

Thanks to generous support from the Nantucket Garden Club, we were able to continue our 5th Grade "Trees in the Community" program. We provided an in-person program and gave out trees as usual for the Nantucket Lighthouse School, but the classroom portion was moved to online for the Nantucket Intermediate School (NIS) and the Nantucket New School. This online class proved very successful with new content added to take the place of interactive activities that normally would have occurred. Now, moving forward, tree root communication will be added to the in-class program too. We still conducted a planting

demonstration for the Nantucket New School, and we left trees for student pick-up at the NIS. We gave out approximately 125 trees and generated an extra \$880 to invest into future tree programs by selling the remaining trees to members of the community.

Summer Discovery Camp

Unfortunately, due to COVID-19, our Summer Discovery Programs were cancelled. However, we are so grateful for the support our camp families showed us during this challenging time. Some accepted refunds in the form of credits for 2021, and many made full or partial donations. Thanks to their kindness and generosity, we still made just over \$25,000.

Free Summer Programs

Many thanks to the Nantucket Conservation Foundation (NCF) for generously providing funds that enabled the MMA to offer free Habitat Hikes on NCF properties to island families and visitors. These programs took place at Windswept Bog and Masquetuck and focused on the flora, fauna, and habitat types found at each location.



Jascin N. Leonardo Finger
Curator of Mitchell House

The year 2020 was indeed a challenge for all and a sad one when we could not open the doors of the Mitchell House to the public for the first time since 1903. Even throughout the Flu Pandemic of

1918/1919, World War One and World War Two, and other world and national events, we were not faced with such a situation. But we need to protect one another and so, the Mitchell House turned to some inward focus and also some different forms of outreach.

The big news for the Mitchell House in 2020 is that with grants from the 1772 Foundation/Preservation Massachusetts and the M. S. Worthington Foundation, we were able to conserve and re-glaze the historic sashes of the House and paint the trim, doors, and sashes. All of the work was completed by James Tyler and his crew in the fall. We were also able at the time to return the House to its darker color of the past. Further conservation included an in-depth focus on ceramics found throughout the House, as well as repairs to the roofwalk hatch and the east gable attic window – all grant funded work.

While we could not meet in person for our second Maria Mitchell Women of Science Symposium (MMWSS) this year as had been planned, we turned to hosting a shorter version online on October 2, 2020. With over 300 registrants, we were able to draw a larger audience as we focused on Inclusion, Diversity,

and Intersectionality. Our keynote was Catalina Martinez of NOAA and our panel was made up of incredible women from all walks of STEM.

They were:

- Sabine von Sengbusch of Siemens
- Serra Hoagland of the US Forest Service
- Dorene Price of Brookhaven Laboratories
- Amy Bower of the Wood Hole Oceanographic Institution (WHOI).

Our fantastic panel moderator was Gwyneth Packard of WHOI and we had the assistance of several students who are on our Advisory Committee to help host the event. Generous sponsors to support the needs of going online included: The American Astronomical Society, Novartis, and the Tupancy-Harris Foundation of 1986. And we were ably assisted in the background by Nantucket Community Television. It was a tremendous and inspiring event and we hope to meet in-person September 25-23, 2021.

Another happening that came out of the 2018 birthday celebration year, like the MMWSS, was the Maria Mitchell Scholarship which is awarded to a graduating senior from Nantucket High School who intends to pursue a degree and career path in a STEM field. 2020's recipient of the one-time \$500 scholarship was Skye Flegg who began attending the University of New Hampshire in the fall of 2020.

And with the wonders of the Internet making our world much smaller, we were still able to assist researchers and students across the globe who were working on

projects, books, and exhibits in which Maria Mitchell was featured. From a new book to come on the Hawthorne family to a work of fiction on the Great Fire of 1846, we received requests for research, archival materials, and historic photograph use from researchers in the United States, Canada, New Zealand, and France to name a few places. Maria Mitchell was also featured in an American Astronomical Society online article for the column "This Month in Astronomical History" part of the Historical Astronomy Division. The curator was asked to write an article celebrating Mitchell's accomplishments on what would have been her 202nd birthday. The curator was also asked by the Woods Hole Oceanographic Institution to research and write an article, exhibit text, and plaque text for the dedication of a room at WHOI in memory of WHOI biologist and founder of modern oceanography, Mary Sears.

The Mitchell House Curator is also the MMA's Deputy Director, and as such she was asked to spearhead the MMA's COVID-19 response from everything from sourcing and purchasing PPE supplies to developing program and working on-site protocols, to contact tracing rules and cleaning protocols and how each of the staff were going to work in office spaces on site— especially when we were allowed back into the museums, sites, and offices. The Pandemic kept us from many events this year,

including the always anticipated Birthday Open House in honor of Maria Mitchell's birthday on August 1. That is something that has been ongoing in some capacity since our founding and was a great disappointment to all of us.

And while there was no internship this year, she hoped for 2020 Mitchell House internship still carried on to some extent albeit remotely as Kari Fossum (Mount Holyoke College 2021) met weekly with the curator via Skype in order to begin to complete research towards a hoped for online exhibit focusing on an aspect of Nantucket and Maria Mitchell's life. More to come in 2021 on this initiative as Ms. Fossum plans to be the 2021 intern. Additionally, we were able to welcome back a volunteer who has been cataloging a Nantucket collection of books donated to us several years ago by Reva and Mort Schlesinger. Joanne Polster has been an enormous help to getting this done and we were glad to be able to have her back following the COVID-19 protocols in late 2020.

While we had limited time on-site for a good portion of 2020 due to COVID-19 restrictions from the Commonwealth of Massachusetts, we still managed to make some strides in the Mitchell House, host our second – but online, shortened version – of the MMWSS, and attend to some activities that we are not able to do in the busy summer months.





Jascin N. Leonardo Finger
MMA Deputy Director

With the COVID-19 Pandemic, the MMA was forced to limit what was completed at the facilities for cost savings. The Pandemic also added a new level to how we worked on the sites with contractors,

landscapers, and others. But despite all of this, we were able to make some much needed repairs with grant support and to keep our buildings in good order throughout 2020. We were also aided by several volunteers when allowed to do so under COVID-19 guidelines. Of greatest note, several efforts for our sites in 2020 are detailed in this report.

Happily, we were able to apply for and receive funding from several foundations and granting agencies that allowed and will allow the MMA to attend to outstanding projects and to begin to realize the conservation of the Maria Mitchell Vestal Street Observatory. With funding from the Community Preservation Act and the M. S. Worthington Foundation, we hope to begin the conservation of this historic Observatory in 2021 as we continue to focus on the maintenance and conservation of our important and in many cases, historic, facilities.

In the Astronomer's Cottage, thus named since many of the MMA's astronomers have lived in the cottage since it was donated to the MMA in the early 1920s but is used to house different senior staff, we made a

continued effort to bring this historic property up to its potential by updating the heating system and making electrical updates. This builds upon a 2016 grant that we received from the Massachusetts Cultural Council which allowed us to complete work to the roof, sidewall shingling, and painting several years ago.

As already noted in this annual report, the Mitchell House received two grants in 2020 – one from Preservation Massachusetts, in collaboration with the 1772 Foundation, and one from the M. S. Worthington Foundation which allowed the MMA to re-glaze the historic sashes of the 1790 House and paint the trim, doors, and sashes. The House also saw the replacement of an east gable window that was not original and now matches the rest of the historic sashes and repairs to its roofwalk hatch – all grant funded.

In Hinchman House, we made a few small updates in the Natural Science Museum which included the installation of a set tub in the old water closet in the Animal Room enabling the cleaning of tanks to be made much easier. Some electrical work was completed in the basement for Aquarium tank support, and the classroom space saw some plumbing updates. With some grant money for painting, we were also able to attend to the exterior of the front entry.

At our properties on Washington Street, we were forced to put in a new water line as the pipe was found to be leaking and broken in several places. We completed this

work in February – just before the Pandemic hit the United States and the island.

With a grant from the Nantucket Garden Club, the Deputy Director was able to place a focus on restoring the native wildflower and plant garden in front of the Vestal Street Observatory by introducing native species which help to support the birds, insects, and other life found on Vestal Street and the island. Our Landscape uses no fertilizers or weed killers of any kind, allowing the fauna to eat and inhabit the area safely. It also means that our Hinchman House animals have safe clover and other edibles to eat and walk through when they are out for exercise. The grant also allowed for some additional seating and we now have a bench at the Vestal Street Observatory and two Adirondack chairs at the MMA Research Center for our visitors.

All of our sites continued to have their requisite inspections – something that must continue for the safety of all and the buildings despite a Pandemic. Of course, issues arise with all buildings and we need

to address any necessary maintenance or emergencies that occur and some did in 2020 with plumbing, carpentry, electrical, and the like. Again, in other areas where we could forego activities for 2020 in order to save money, we did. But we have worked very hard over the last few years to bring our buildings up to a high level of preservation, as we have designated in our strategic plan. Thus, we are constantly seeking and applying for grants and gifts that support these efforts.

Finally, we had several volunteers including Nancy Giragosian who attended to the Astronomer's Cottage garden and lawn and window boxes and Geoff Smith who helped us to cut back some overgrown areas and roses at the MMA this fall. It is volunteers who help us make a difference, too, and the Deputy Director would love to have people join a new garden group that will put volunteers to work twice a month in-season to attend to the gardens at the MMA with the Deputy Director. It is a fun, team building experience and we hope you will contact us about this new volunteer effort.





Logan S. Gomes
Director of Advancement

The MMA's Advancement efforts were very nimble this year. Because of COVID-19, fundraising events were quickly reimagined, and our development plan

was thoughtfully modified. In anticipation of an atypical summer, we launched an Emergency Resiliency Fund (ER Fund) in May, aimed to help offset lost special event and membership revenue. With our facilities and programs greatly impacted by the Pandemic, we knew the latter would be down. The ER Fund was a success, and we were very grateful for the 187 donors who made timely and generous contributions, enabling us to raise over \$220,000 during a time in which our camps and programs were halted.

Shortly thereafter, we launched two new "Wish Upon a Star" auctions for one-month, VIP parking spaces at 29 and 33 Washington Street respectively. These creative and fun fundraisers, which featured results live streamed via social media, helped us generate excitement and attract new donors. Many have already asked if we will offer this auction again in 2021 – and we will!

In an effort to stay engaged with past MMA Gala sponsors, we hosted a phone-a-thon, contacting previous sponsors and asking for their continued support even though we were unable to host a Gala in 2020. The phone-a-thon proved successful and helped us stay connected to supporters.

Because we could not bring together our Honorary Board during the summer, we hosted a fall Virtual Meet and Greet with MMA Interim Executive Director Jason Bridges. The gathering provided an opportunity for our Honorary Board Members to hear our COVID-19 scenario planning and offer feedback and advice.

Our 2020 Year-End Campaign brought in a record number of supporters, with 102 more donors participating compared to 2019, yet year-end revenue was slightly down compared to the prior year. We anticipated a potential decline in this specific fund, because many supporters had already participated in our Emergency Resiliency Fund. Overall, we saw an increase in contributions compared to 2019. This timely support truly helped us weather the Pandemic's impact on our organization.



Kelly Bernatzky, Development Associate

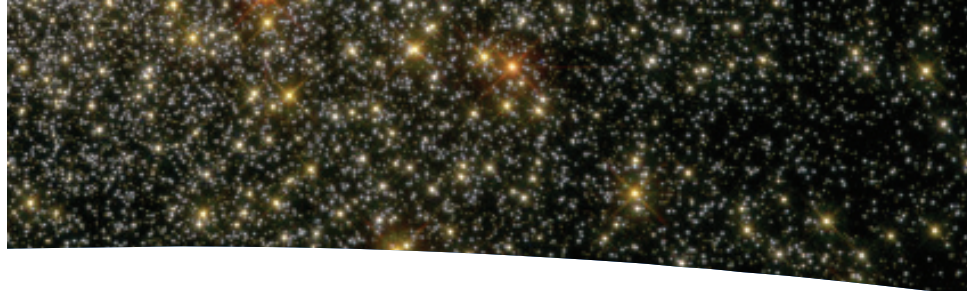
We were very grateful for the continued grant support from numerous foundations, as noted on page 29, and we were quick to research and apply for new grant opportunities in light of the Pandemic. As a result, our grant revenue increased compared to 2019. A special thank you to the Community Foundation for Nantucket for their COVID-19 relief funding initiatives.

Two major development and communications related advancements included the upgrade of our donor database from Abila to Raiser's Edge by Blackbaud and the redesign of our website. The new database allowed our Advancement Office to be more efficient in data management and reporting. The redesign of our website was a major undertaking and enabled us to modernize

our site, making it more innovative and user-friendly. The website redesign, led by MMA Development Associate, Kelly Bernatzky, and conducted by MoorStudio, was generously funded by a grant received from the Community Foundation for Nantucket's ReMain Nantucket Fund. The eagerly anticipated new site is expected to launch in February 2021.

The Development Office welcomed former MMA intern, Kelly Bernatzky (2018 Mitchell House Intern), back to the organization as the new Development Associate. A graduate of Vassar College, Bernatzky first became familiar with the MMA when she wrote a report about Maria Mitchell in the third grade. Bernatzky will be managing our communications and grants and assisting with special events.





Supporting Members

Individual Supporting Members

\$2,500

Susan and Michael Baer
Donna and Tom Jarecki
Ginger and Marlin Miller, Jr.

\$1,000

Charles Hoopes and Megan Landeck
John and Diane Samuels
Happy and Samuel Shipley, III
The Walkey Family

\$500

Allen Bell and Dennie Doran
James D. Carey
Chip Carver and Anne DeLaney
Hilary and Ara Cohen
Dennis Cross
Lisa Gustavson
Sonya Keene and John Moy
James Meehan and Patricia White
Herbert and Miriam Mittenthal

\$250

Sam and Janet Bailey
Bill and Sara Congdon
Barbara and James Duffy
John and Christine Ellis
David and Vinita Ferrera
Paul and Susan Meister
Michael and Julia Milone
Earl and Iris Mix
Ben and Jackie Normand
Suzanne Obrecht
Sam and Ellen Phelan
David and Elizabeth Powell
William and Laurie Schutt
Marianne and John Stanton

L. Parker Stephenson
Seth and Jennifer Stier
Jonathan Swain

Annual Fund

\$25,000+

Richard Bard and Susan Blount
* Capacity Building Fund
Margaret and John Falk
* Capacity Building Fund

\$10,000-\$24,999

Archibald Family Foundation
Michael and Tina Jemison
* Capacity Building Fund
Tupancy-Harris Foundation of 1986
* Capacity Building Fund

\$5,000-\$9,999

Anonymous
Curt Burwell and Christine Ryan
Chris and Missy Griffiths
* Capacity Building Fund
Toni and Martin McKerrow
Richard and Ronay Menschel
Tamsen Merrill and Gregory Thorp

\$1,000-\$4,999

James and Garland Alban
Atlantic Landscaping
Dinah and Barry Barksdale
Dr. David H. and Beverly A. Barlow
Max and Pamela Berry
Harrington and Constance Bischof
Eileen Butler
Richard and Sally Charpie
Congdon & Coleman Insurance Agency
Amanda B. Cross
Brendan and Jumana Culligan
Barbara and James Duffy

Fisher Real Estate
 Robert and Barbara Friedman
 Nancy and Charles Geschke
 Gilbert Verney Foundation
 Margaret Gilfoy
 Zachary and Lindsey Gund
 Robert and Mary Haft
 Brett and Amy Harsch
 John and Tricia Hartner
 Kevin and Carolyn Holt
 Brad and Lisa Larson
 Amanda and Bill Liddle
 Edward and Deedie McCarthy
 Stephen and Laetitia Mead
 Polly and Nick Miller
 Moose Moss Donor Advised Fund
 Craig and Ann Muhlhauser
 Michael and Joan Nelson
 Susan and Scott Nelson
 North Pond Foundation
 Al and Mary Novissimo
 Richard K. Lubin Family Foundation
 Kate Lubin and Glendon Sutton
 Peravid Foundation
 Julie and Matt Richardson
 David and Ellen Ross
 Eileen Rudden and Josh Posner
 Mark and Samantha Sandler
 Cary and Elaine Schwartz
 Randee Seiger
 Lynda Vickers-Smith
 Lorraine Snell
 Nancy Snell
 Stillwater Charitable Trust
 Brian and Kate Sullivan
 Frances Symes
 Donald and Deborah Van Dyke
 Constance and Robert Walkingshaw
 Susan Weatherley
 Tim and Helene Weld

\$1-\$999

Skip and Lulu Ahneman
 Amazon Smile
 American Family Insurance
 Thomas Anathan
 Stephen and Marcia Anderson
 Ginger Andrews

* In memory of Clint and Edith Andrews
 Robert and Lili Anolik
 Anonymous
 Anne and Sandy Apgar
 Jennifer Backus
 * In honor of Jenny Ord
 Denise Badders
 Kathleen Baird
 Amy Baldwin and Hugh Davis
 Joseph Barr
 Mary and Peter Barrett
 Ashleigh and Scott Beardsley
 Rebecca Becker
 John and Judith Belash
 Colin Bernatzky
 Kelly C. M. Bernatzky
 Ruth and Robi Blumenstein
 Julia Blyth
 Jay and Carol Bowditch
 Paulette and Fred Boling
 Bruce and Lisa Bond
 Kim Botelho
 * In honor of Logan Gomes
 Georgette and Solomon Boucai
 Robert and Lacey Brandt
 Vivienne and Michael Brennan
 Jason and Courtney Bridges
 Eugene and Susan Briskman
 Margaretta Brokaw
 Blair and David Browne
 Andrea Brue
 Elizabeth and Andy Buccino
 Bill and Laura Buck
 Dr. Bonnie J. Buratti
 Martha Butler
 George and Kathleen Butterworth
 Mr. and Mrs. James D. Carey
 John B. Carroll
 Diana and Hill Carter
 William T. Cashman
 Karen Castle and John Mahoney
 Dr. Nancy Chanover
 Katherine P. Cheek
 Julia and Sergey Chumak
 Pamela Clark
 Constance Cocroft
 Nicole Cosgrove
 Chris H. Cowperthwait

Laura Crocker
 Emma Dahl
 Ms. Sheila David and Dr. David Policansky
 Dean Hutton Fund
 Susan Doughan
 Daniel and Judith Drake
 Bill and Lois Druckemiller
 Jack Dubinsky
 Karen Dubinsky
 Lee and Tharon Dunn
 Bob and Marsha Egan
 Ana and Michael Ericksen
 Ernst Land Design
 Caroline Farr and Terry Harvey
 Martha and Paddy Farrell
 Matt and Shelia Fee
 Kristie and Benjamin Ferrantella
 Jascin and Eric Fisher
 * In memory of Edith Andrews
 Erich Fischer and Hallie Henderson
 Monica and Stuart Flegg
 Bob and Bonnie Ford
 Trinity Foreman
 Craig and Mary Gambee
 Eileen Gebrian and Timothy Barberich
 Dr. Henry Gewirtz
 Edward Gillum and Sarah Horne-Gillum
 Ms. Meg Glidden
 Logan S. Gomes
 Kathleen Graber
 Joe and Maria Grause
 Fifi Greenberg
 Toby A. Greenberg
 Katharine Robinson Grieder and James Grieder
 Kathy and Bill Grieder
 Elizabeth and Reade Griffith
 Tom and Kim Griswold
 Lauren and Paul Gudonis
 Joan and Philip Gulley
 Lydia Gullicksen
 Joan and Roy Gustaveson
 Edmund and Barbara Hajim
 Charles and Kaaren Hale
 Ellen Harde
 Jason and Natasha Harman
 Dorothy Hesselman
 Megan Hodgson
 Michael Holdgate and Dawn Hill Holdgate

Sandra Holland and Alfred Sanford
 James and Elizabeth Holt
 Robert and Allison Inglis
 Richard and Virginia Irwin
 * In honor of Ginger Andrews
 Sarah and Christopher Irwin
 Harvey Jones
 Dr. Regina A. Jorgenson
 Wilbur and Maja Jorgenson
 JustGive.org
 Ms. Judy T. Karpen
 * In memory of Dorrit Hoffleit
 Dr. Julie Kaufman
 Woody and Jane Kay
 Dennis and Connie Keller
 Michael Kellerman
 Marty and Lance Kelly
 Brian Kelly and Kathleen Cannon
 Drs. Robert and Anne Kennedy
 Kristin Ketterer
 Robert and Sharon Kiss
 Dr. and Mrs. R.F. Knauff
 Robert Knecht
 Kathi and Dan Knise
 Tarini Konchady
 Andrew and Emily Kotchen
 Jeffrey Krupa
 Regan and William Landreth
 Jason and Vanessa Larrabee
 * In honor of Kim Botelho
 Kathy Lasota
 Lucy Lau and Christopher Keogan
 Judith F. Lee
 Brian and Kathleen Legg
 Lenzner Family Foundation
 * In memory of Terry Lenzner
 Edwin Deane Leonard
 Larry and Susan Levine
 * In memory of Adam Bloom
 John Liu
 Victoria Livingstone
 Ken and Grace Logan
 Pamela Lohmann
 Mary Longacre
 Mark and Christa Lopez
 Thomas B. Loring
 Deborah Lothian
 Richard Lowry

Will and Alanna Lucas
 Nancy Lucchini
 Warren and Roberta Lyman
 Dr. & Mrs. Malcolm and Karen MacNab
 Debra and Vince Maffeo
 Maureen Manning
 Deb and Peter Manus
 Mara Maral
 Sally L. Marrer

* In honor of Ella Griffiths

Elizabeth Marshall
 Stephen and Julia Maury
 Eugene and Pamela McGuire
 Mary Lou McGuire
 Peter McHugh

Andrew A. McKenna-Foster
 Katie and Bill McNabb
 Bernadette Meyer
 Mr. and Mrs. William C. Miller IV
 Ellen Mitchell and Charles Byrne
 Herbert and Miriam Mittenenthal
 Ashley Mody

* In honor of Frances Symes

Brooke and Charlie Mohr
 Miguel Morocoima
 George and Barbara Mrkonjic
 Carl M. Mueller
 Patricia Munoz
 Jennifer and David Neighbours
 Jennifer Nelson
 Network for Good
 Deborah Nicholson
 Sean and Gina O'Callaghan
 Robert A. Olson
 Reina Oostingh
 Barbara O'Reilly
 Nannette Orr
 Keenan Pace

Catherine and Mark Parsells

* In honor of Judy MacLeod

Bradford and Shira Paul
 Evan Peverley and Michelle Cruz
 Nathaniel and Melissa Philbrick
 Dr. Douglas Horst and Ms. Maureen Phillips
 Linda M. Phillips
 Libby Pingpank
 Drs. William G. Porter and Peggy Davis
 Jay and Margaret Rachfal

Frank and Jennifer Rand
 John and Monique Reed
 Diana R. Regan
 Allen Reinhard
 Katherine Rhode and John Salzer

* In memory of Meg Perkins

Mrs. Jay W. Riggs
 Gretchen and Jay Riley
 Karen and Fred Ringwald
 Virginia and Joseph Ripp
 Romankiewicz Family Fund
 Kermit Roosevelt

* In memory of Corinne Roosevelt

Dr. & Mrs. Nicholas and Sueanne Rorick
 Joan Rosenberg
 Robin and Mickey Rowland
 Alicia Ruggiero and Patrick Burnett
 Charles and Shona Ryan
 A.J. Ryder
 Bonnie Johnson Sacerdote
 Gayle and Joseph Santucci, Jr.
 Charles Sawyer
 Denise and Doug Schenkel
 Lois Schmidt
 William and Laurie Schutt
 Robert Schwed
 Harry and Christina Schwefel
 Ivy and Fran Scricco
 Jeff Shapiro and Mary Howell
 Mrs. John J. Shea
 Mary Shockey
 Les Silverman

Alan Sliski and Susan Katz Sliski
 Ms. Mary Anne Sloan
 Margaret Stineman
 Ann Stock
 Georgia Stolle-McAllister
 Eric and Dominic Stone
 Vladimir Strelnitski
 T Theory Foundation

* In memory of Terry Laundry

Mr. and Mrs. James V. Tanzola
 Cammy Oechsli Taylor and R. Scott Taylor
 Richard and Judithann Thayer
 James Thomas and Flor de Maria Thomas
 R. Scott Toop and Laura Rosene
 Gary and Ellen Tratt
 *In honor of Bob Kennedy and Ginger Andrews

Betsy and Jim Tyler
 Gary and Shelley Vogel
 Hollis Von Summer
 Gary and Kathy Walker
 Nancy and Charles Walters
 Suellen Ward and John Copenhaver
 Denise Watkins
 W.B. Marden Co.
 Dr. & Mrs. Joel and Judith Weinstein
 Elizabeth Weiss
 Stephen Welch
 Welch & Associates, Inc. Realty Group
 Harry Wilcox
 Hugh and Elizabeth Wilkinson
 Will Brown Fund
 Howard Willard
 Emily and Tom Wood
 Dr. and Mrs. Jim and Susan Yue
 * In honor of Carolyn Holt
 David Yuen and Sarah Neroni

 Emergency Resiliency Fund
 \$15,000+
 Barbara and Amos Hostetter
 John S. Weatherley Charitable Foundation

 \$5,000-\$14,999
 Dr. James Burruss and Dr. Mary Fontaine
 Ella George Children's Foundation
 Margaret and John Falk
 Carolyn and Kevin Holt
 Helaine Greenfeld and Richard Mintz
 Molly and Chris Paiement
 Piantino Family Foundation
 The Walkey Family
 Jon and Carlyn Zehner

 \$1,000-\$4,999
 Richard Bard and Susan Blount
 Dr. David H. and Beverly A. Barlow
 Benevity - BlackRock
 Harrington and Constance Bischof
 Lisa-Margaret Bryan
 Curt Burwell and Christine Ryan
 The Cox Foundation, Inc.
 Christopher and Christina Crampton
 Dr. Deborah Crocker
 Amanda B. Cross

Ferrera Family Giving Fund
 Sandra Fossum
 Ralph and Julie Geer
 Joseph and Jane Gifun
 John and Tricia Hartner
 Douglas Hersh and Sarah Little
 The Judy Family
 Arthur and Diane Kelly
 Denice Kronau and Michael Reitterman
 Bruce Lawler and Lisa Clarey-Lawler
 Toni and Martin McKerrow
 Kevin and Beth McMeen
 Tamsen Merrill and Gregory Thorp
 Craig and Ann Muhlhauser
 Michael and Joan Nelson
 Jeffrey and Julie Parker
 Dr. Nathaniel Poor
 Eileen Rudden and Josh Posner
 Gayle and Joseph Santucci, Jr.
 Heather Sharer and Dirk De Roos
 Happy and Samuel Shipley, III
 Janet Steinmayer
 * In memory of Alwin Steinmayer, Jr.
 Gary and Kathy Walker
 Robert and Constance Walkingshaw
 * In honor of Dave Gagnon
 Tim and Helene Weld

 \$1-\$999
 Anne and Sandy Apgar
 Mariann Berg Hundahl Appley
 Nancy Beebe
 Dr. & Mrs. Howard and Susan Bloom
 Paulette and Fred Boling
 Bruce and Lisa Bond
 Christin and Steven Brecher
 Susan and Coleman Burke†
 Ann Buttrick
 Kathryn Carlson
 Allison Carneal
 Charina Endowment Fund
 David and Anne Choate
 Congdon & Coleman Insurance Agency
 Paul and Nancy Connolly
 Clare Cunningham
 Emma Dahl
 Ms. Sheila David and Dr. David Policansky
 Tracey Dominick

Suzanne Dominick
 Karen Dubinsky
 Kelley and Ben Ellis
 Kristie and Benjamin Ferrantella
 Susan and Norman Fidel
 Jascin and Eric Finger
 Fisher Real Estate
 Stuart and Monica Flegg
 Bob and Bonnie Ford
 Trinity Foreman
 David Gagnon and Shelley Dresser
 Robert and Elizabeth Gambiae
 Dr. & Mr. Melinda and Bill Gardner
 Dr. Henry Gewirtz
 Nancy Giragosian and Burton Went
 Drs. John and Margaret Goldman
 Logan Gomes
 Joe and Maria Grause
 Reade and Elizabeth Griffith
 Carey Gross
 Joan and Philip Gulley
 Henry and Karoly Gutman
 Barbara and Jerry Hamelburg
 Molly Harding and Joe Manning
 Hatch's Package Store
 Lucile Hays
 Cora Hersh
 Sandra Holland and Alfred Sanford
 Ashley Holt
 Kimberley Homer
 Arthur and Nancy Hooper
 Maris Humphreys
 Elizabeth Jacobsen
 Cecil Jensen
 * In honor of Dave Gagnon
 Charles and Ann Johnson
 Wilbur and Maja Jorgenson
 PJ Kaizer
 Dr. Frances Karttunen
 Betty Kenan
 Drs. Robert and Anne Kennedy
 Anne and John Kennedy
 * In honor of Toni McKerrow
 Marion and Jennifer Killion
 Ed Klein
 Dr. Margaret Koehm
 Tarini Konchady
 Heyward Lathrop

Judith F. Lee
 Edith and Salvatore Lentini
 Dr. & Mrs. Timothy and Cathleen J. Lepore MD
 *In honor of Nantucket Cottage Hospital Nurses
 Keith and Janet Lindgren
 * In honor of Ned Symes
 Mark and Gretchen Lytle
 MacArthur Family Charitable Foundation
 Ginger MacDonald
 Jan and Russell MacDonnell
 Dr. & Mrs. Malcolm and Karen MacNab
 John Mahoney and Karen Castle
 Madaket Marine
 Kaitlin Mallouk
 Mrs. Seymour Mandell
 Bill and Barbara Maple
 Sally L. Marrer
 Elizabeth Marshall
 Lucinda May
 Andrew A. McKenna-Foster
 Katie and Bill McNabb
 Drs. Joel Bowman and Pat Michaelson
 Kimberly Morrow
 Christopher and Winnie Mortenson
 Barbara O'Reilly
 Ann and Hardy Oliver
 Sam and Ellen Phelan
 Ms. Maureen Phillips and Dr. Douglas Horst
 Frank and Jennifer Rand
 Victor and Maureen Reed
 Carey Dack-Reidy and Paul Reidy
 Stephen Rogers
 Alicia Ruggiero and Patrick Burnett
 John and Sharon Sayles
 Sarah Scott
 Judith G. Seinfeld
 Mary Shockey
 Linda G. Steelman
 Kathy Stolle-McAllister
 Esta-Lee and Harris Stone
 Vladimir Strel'nitski
 Jonathan Swain
 * In memory of Virginia C. Swain
 R. Scott Toop and Laura Rosene
 Gary and Ellen Tratt
 Michael Trimpi
 Alicia Van Cott
 Heather Vance

Lee Venolia and John Thoman
 Katherine Vernace
 Kathleen Volpe and Michael Shaner
 * In honor of Carolyn Holt
 Stephen Weinstein

Event Fundraising
 Dr. David H. and Beverly A. Barlow
 William & Ginny Birch
 Laura Debonis and Scott Nathan
 Daniel and Judith Drake
 Barbara and James Duffy
 Anne and Chad Gifford
 Joan and Philip Gulley
 Peter and Maria Kellner
 Ann and Hardy Oliver
 Nathaniel and Melissa Philbrick
 Bebe Archibald Poor, D.V.M., M.S.
 Kenneth and Ellen Roman
 Gayle and Joe Santucci, Jr.
 William and Laurie Schutt
 Merrielou and Ned Symes
 Donald and Deborah Van Dyke
 Lynda Vickers-Smith

Restricted Gifts

Adam Bloom Memorial Scholarship Fund
 In Memory of Adam Bloom
 Network for Good

Astronomy
 Seth D. Hornstein

Barn Owl / Osprey Program
 Doug and Nancy Abbey
 Leanne M. Bell
 Ruth and Robi Blumenstein
 Scott Booth and Valentina Gandini
 Susan and Coleman Burke†
 Kirsten and Lindsay Congleton
 Joanne Costakes
 Jeffrey and Denise Dickson
 Hadley and Jesse Dutra
 John and Margaret Falk
 Aristides Georgantas
 Lynne and Jeffrey Heyer
 The Horizon Foundation for New Jersey

Evan and Cindy Jones
 Kristin Juelson and David Rubaltelli
 Sonya Keene and John Moy
 Peter and Maria Kellner
 Patty and Gerry Keneally
 Rick and Sarah Knauff
 Susan and Jay Lawton
 Susan and William Learnard
 Jennifer Littman
 Sherry Lowe
 Brenda McDonough
 Medouie Creek Associates
 Polly and Nick Miller
 Jeffrey and Julie Parker
 Jay and Gretchen Riley
 George and Ann Thom
 Richard and Meredith Tolsdorf
 Gary and Ellen Tratt
 Bill Untereker
 Tod and Allyson Waterman
 Brace and Landis Young

Birdathon
 Mass Audubon*

*The 2020 event was a collaboration
 between the MMA and Mass Audubon.
 A heartfelt thank you to our individual
 donors.

Education Program
 Stacy Abramson
 James and Garland Alban
 Grace Bardsley
 Amanda and James Boening
 Christina Boling
 Blair and David Browne
 Kim and Chris Browne
 Deborah Bulkley
 Julia and Sergey Chumak
 Constance Cocroft
 Kristen Congdon
 Brooke Courtney
 Ana and Michael Erickson
 Nelson and Elizabeth Erickson
 Madeline and Pedro Escudero
 John and Margaret Falk
 Jay and Natasha Harman

Amy and Brett Harsch
 Megan Hodgson
 Tucker and Michelle Holland
 Gloria and Jeffrey Holtman
 Sarah and Christopher Irwin
 Kristin Ketterer
 Quincy Kresler
 Regan and William Landreth
 Laurie and Peter Lewis
 Page Martineau
 Sue Minkoff and John Zweck
 Matt and Ashley Mitchell
 Wendi Murrell
 David and Jennifer Neighbours
 Libby Pingpank
 Matthew and Jamie Roberts
 Amy and Gregory Rowland
 Charles and Shona Ryan
 Shannon Selden
 Jim Sperber
 Laura and Brian Steele
 Meg Succop and Rob Adams
 Colleen and Graves Tompkins
 Jessica N. Torre D.D.S., P.C.
 Hollis von Summer
 Elizabeth Weiss

In-Kind
 Ginny and Bill Clarke
 Brett and Sam Dean
 Karen Dubinsky
 Harsch Family
 John and Tricia Hartner
 Dr. Charles Innis, New England Aquarium
 Marcia Kane
 Ernest Lawton
 Linda Loring Nature Foundation
 Marine Home Center
 Nantucket Bookworks
 Nantucket Cottage Hospital
 Offshore Animal Hospital

Maria Mitchell Women of
 Science Symposium
 2020 Virtual Symposium Sponsor
 American Astronomical Society

Novartis
 Jane Tausig
 Tupancy-Harris Foundation of 1986

Nantucket Science Festival
 Dr. David H. and Beverly A. Barlow
 Cape Cod 5 Foundation

Natural Science
 Aristides Georgantas
 Hudson Holland IV Memorial Fund
 Jeffrey and Julie Parker
 Dan Venuto

Science Speaker Series Sponsors
 ACKclimate
 Cisco Brewers
 Nantucket Island Resorts
 Osceola Foundation
 University of Florida/Preservation Institute
 Nantucket

Trees in the Community Program
 Mary Mann
 Nantucket Garden Club

Grant Support
 Admiral Sir Isaac Coffin Lancasterian School
 CARE for the Cape & Islands
 Community Foundation for Nantucket
 Emergency Relief Fund
 Community Foundation for Nantucket's
 Nantucket Fund - Education
 Community Foundation for Nantucket's
 ReMain Nantucket Fund
 Highland Street Foundation
 Nantucket Garden Club
 Nantucket Golf Club Foundation
 National Science Foundation
 Preservation Massachusetts Inc. - 1772
 Foundation
 ReMain Nantucket, LLC
 TownofNantucketCommunityPreservationAct
 Weezie Foundation
 Whole Kids Foundation
 The M.S. Worthington Foundation, Inc.

Donations

Mitchell House, Archives and Special Collections Donations

France Karttunen, Ph.D.: handwritten essay by Maurice E. Gibbs (her grandfather) on "Birds of Nantucket" for his Coffin School graduation, 1886.

Barbara Duffy: Scrapbook of photographs, advertisements, correspondence, and script for her one-woman play on Maria Mitchell, first performed on Nantucket at the Coffin School with the MMA by France Sternhagen in 2003.

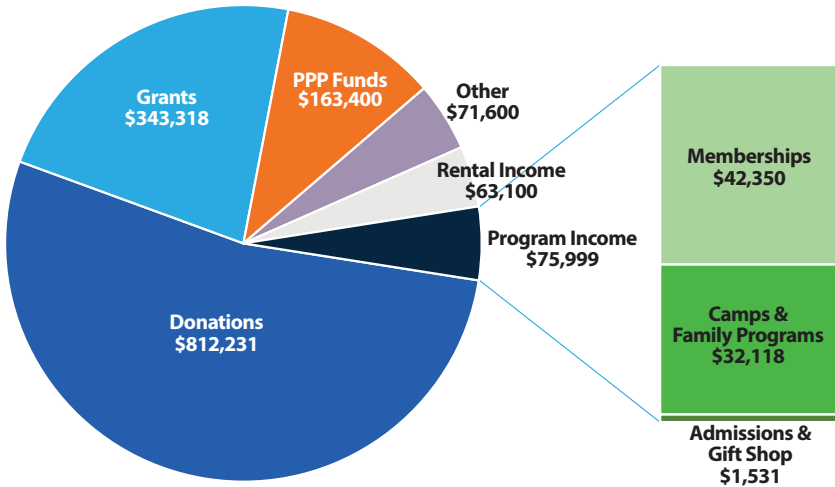
Elisabeth Jacobsen: Nooks and Corners of the New England Coast by S. A. Drake, 1875.

Margaret Falk: Summer Wildflowers of the Northeast (2020) and Spring Wildflowers of the Northeast (2012) by Carol Gracie.

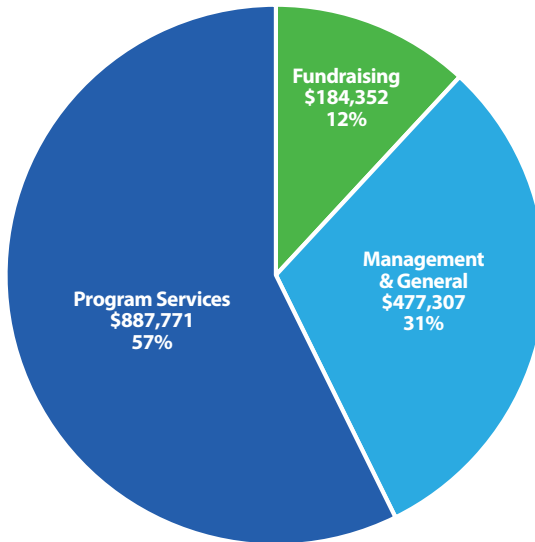
Joanne Polster: Geology Along the Going-to-the-Sun Road Glacier National Park, Montana, 1983 and White Wolf: Living With An Arctic Legend, J. Brandenburg, 1988.



2020 Revenue Sources



2020 Expenses





Statement of Activities

Year ended December 31, 2020

	2020
REVENUE & SUPPORT	
Contributions*	812,231
Grants	343,318
PPP Loan (forgiven)	163,400
Programs	32,118
Membership	42,350
Admissions & Gift Shop	1,531
Other Income	134,700
Total Revenue & Support	1,529,648
EXPENSES	
Program Services	887,771
Management & General	477,307
Fundraising	184,352
Total Expenses	1,549,430
Change of net assets from operating activities	(19,782)

* includes multiyear pledge income recognized in 2020 and donations made in lieu of special events.



Statement of Financial Position

Year ended December 31, 2020

	2020
ASSETS	
Cash & Cash Equivalents	275,058
Accounts Receivable	27,094
Pledges Receivable	277,306
Prepaid Expenses	28,443
Investments	2,681,579
Note Receivable	245,878
Remainder Interest in Property	1,297,626
Property & Equipment, Net	6,284,279
Total Assets	11,117,263

LIABILITIES & NET ASSETS	
Accounts Payable & Accrued Liabilities	267,285
Notes Payable	110,000
Long Term Debt	1,052,736
Total Liabilities	1,430,021

NET ASSETS	
Without Donor Restrictions	5,850,127
With Donor Restrictions	3,837,115
Total Net Assets	11,117,263

Board of Directors
 Helene Weld, President
 Judy MacLeod, First Vice President
 Frances Symes, Second Vice President
 Curt Burwell, Treasurer
 Joseph Santucci, Jr., Clerk
 Richard Bard
 Beverly Barlow
 Margaret Falk
 Chris Griffiths
 John Hartner
 Carolyn Holt
 Toni McKerrow
 Michael Nelson
 Molly Paiement
 Mary Archibald (Bebe) Poor, D.V.M.
 Katherine Rhode, Ph.D.
 Brian Sullivan
 Jane Tausig

Honorary Board of Directors
 Howard Blitman
 Sally Charpie
 John Daniels
 Daniel Drake
 Joan Gulley
 Judith Lee
 Malcolm MacNab, M.D., Ph.D.
 Eileen McGrath
 Nathaniel Philbrick
 Anne Parks Strain
 Edward Symes, III
 Derek Till†

Administration

Executive Director
 David Gagnon (through August, 2020)

Interim Executive Director
 Jason Bridges (starting August, 2020)

Deputy Director
 Jascin N. Leonardo Finger

Director of Advancement
 Logan Gomes

Development Associate
 Lydia Gullicksen (through July, 2020)
 Kelly Bernatzky (starting July, 2020)

Finance & Information Administrator
 Katharine Robinson Grieder

Facilities Volunteers
 Nancy Giragosian, Geoff Smith

Natural Science

Field Ornithologist
 Virginia Andrews

Research Center Coordinator
 Jack Dubinsky

Collections Manager
 Julia Blyth

Natural Science Affiliated Staff
 Robert S. Kennedy, Ph.D. Senior Research
 Fellow, Barn Owls and Ospreys
 Valerie A. Hall, Ph.D. Research Associate,
 Scallops
 Andrew McKenna-Foster Research
 Associate, Spiders

Natural Science Volunteers
 Mitch Blake, Neil Foley, Ella Potenza,
 Jen and Tucker Reinhard, Tim and
 Kim Griswold

Aquarium Director
 Jack Dubinsky

Marine Animal Care
 Stephanie Ryder

Aquarium Volunteers
 Kara Chuang, Sarah Hurlock, Elizabeth
 Pellegrini

Astronomy

Director of Astronomy
 Regina Jorgenson, Ph.D.

Telescope Engineer
 Gary Walker

MMO Research Fellow
Jay Chittidi (through August, 2020)
Georgia Stolle-McAllister (starting
September, 2020)

NSF-REU Astronomy Interns
Devon Barros, Bridgewater State University,
Class of 2022
Kiana Burton, Temple University, Class of 2021
Sarah Graber, Columbia University, Class of 2021
Alex Granados, Wellesley College, Class of 2021
Andrea Mejia, Hunter College–City University of
New York, Class of 2021
Natalia Villanueva, Harvard University, Class of 2023

MMO Volunteer
Saoirse Ryan

Affiliated Astronomers
Suvi Gezari, Ph.D.,
Space Telescope Science Institute
JJ Hermes, Ph.D.,
Boston University
Meredith MacGregor, Ph.D.,
University of Colorado, Boulder
Rodolfo Montez, Jr., Ph.D.,
Chandra X-Ray Center, Center for
Astrophysics | Harvard & Smithsonian
Melania Nynka, Ph.D.,
Massachusetts Institute of Technology

Education

Director of Education
Kim Botelho

Education Coordinator
Molly Zegans

Giving Garden Assistant
Jordan McHugh

Animal Care/Education Assistant
Elizabeth Early
Dan Souza
Dan Venuto, Jr.

Animal Care Assistant
Zacil Nash

Remote Education Intern
Dana Murray

Volunteers
Eli Holland
Annie Mendelsohn
Ben Miles
Christopher Riba-Payne
Cristobal Paz

Mitchell House, Archives & Special Collections

Curator of the Mitchell House,
Archives & Special Collections
Jascin N. Leonardo Finger

Remote Internship
Kari Fossum, Mt. Holyoke College, Class of 2021

Volunteer
Joanne Polster

Maria Mitchell Women of Science Symposium

Committee
Gwyneth Packard, Co-Chair
Joe Santucci, Co-Chair
Sarah T. Bois, Ph.D.
Joel Bowman, Ph.D.
Curt Burwell
Maresia Donald, Ph.D.
Patricia Michaelson, Ph.D.
Kathy Rhode, Ph.D.
Jane Tausig
Jascin Leonardo Finger, Ex-Officio, originator
Regina Jorgenson, Ph.D., MMA Staff

Advisory Board
Catherine Bischoff
Kim Botelho, MMA Staff
Sheila David
Denice Kronau
Jackie MacDonald Gibson, Ph.D.
Heather Goldstone, Ph.D.
Stella Kafka, Ph.D.
Celia Mulcahey
Jocelyn Navarro
Bridgette Yang

The MMA conducts many ongoing research programs both on its own and with various collaborators

Herbarium

- Nantucket Flora
Led by Kelly Omand, Nantucket Conservation Foundation

Marine Science

- Atlantic Horseshoe Crab Spawning Surveys (No data collected in 2020 due to COVID-19 Pandemic)
Led by Derek Perry, Invertebrate Fisheries Project, Massachusetts Division of Marine Fisheries
- Eelgrass Biodiversity Surveys (No data collected in 2020 due to COVID-19 Pandemic)
Led by Jack Dubinsky, MMA Aquarium Director, Research Center Coordinator
- Marine Invader Monitoring and Information Collaborative (MIMIC)
Led by Adrienne Pappal, Massachusetts Coastal Habitat and Water Quality Program Manager
- Nantucket Beach Green Crab Survey (Citizen Science Project)
Led by Jack Dubinsky, MMA Aquarium Director, Research Center Coordinator
- Scallops, Shellfish
Led by Valerie Hall, Ph.D., MMA Scallop Researcher

Natural Science

- American Burying Beetle Reintroduction Project (No data collected in 2020 due to COVID-19 Pandemic)
Led by Lou Perrotti, Director of Conservation Programs, Roger Williams Park Zoo
- Nantucket Barn Owl Monitoring Program
Led by Bob Kennedy, Ph.D., MMA Senior Research Fellow
- Nantucket Bird-At-Home-A-Thon
Hosted by the MMA and Mass Audubon
- Pursweb Spider Analysis
Led by Michael Skvarla, Penn State and Ray Fisher, University of Arkansas

Astronomy

Fast and Fortunate for FRB Follow-up (F4) Collaboration:

- FastRadioBursts(FRBs)asProbesofthe Comic Web
 - o Collaboration leaders are:
 - » Dr. Regina Jorgenson (MMO)
 - » Dr. J. Xavier Prochaska (UC Santa Cruz)
 - » Dr. Nicolas Tejos (Pontificia Universidad Católica de Valparaíso)
 - » Dr. Wen-Fai Fong (Northwestern University)
 - o Collaboration contains many other internationally based members.

Galaxy Formation and Evolution:

- Probing the High-Redshift Circumgalactic Medium (CGM) through Quasar Absorption Line Tomography
 - o Abby Mintz (Yale University)
 - o Dr. Regina Jorgenson (MMO)
 - o Dr. Mark Rafelski (Space Telescope Science Institute)

NSF-REU Research:

- Sharpening NuSTAR X-ray Images of Pulsar Wind Nebula G21.5-0.9
 - o Devon Barros (Bridgewater State University)
 - o Dr. Melania Nynka (MIT)
- First Millimeter Flares Detected From Epsilon Eridani With ALMA
 - o Kiana Burton (Temple University)
 - o Dr. Meredith MacGregor (University of Colorado, Boulder)
- Search for X-rays from RV Tau Variable Stars
 - o Sarah Graber (Columbia University)
 - o Dr. Rodolfo Montez, Jr. (Center for Astrophysics | Harvard & Smithsonian)

- Using TESS Data to Search for Transiting Exoplanets Around White Dwarfs
 - o Alex Granados (Wellesley University)
 - o Dr. JJ Hermes (Boston University)
- Untangling the Cosmic Web: VLT/MUSE Observations of FRB Host Galaxy 180924
 - o Andrea Mejia (CUNY- Hunter College)
 - o Dr. Regina Jorgenson (MMO)
 - o Jay Chittidi (University of Colorado, Boulder)
 - o Georgia Stolle-McAllister (MMO)
- Systematic Classification of Tidal Disruption Event Light Curves from the Zwicky Transient Facility
 - o Natalia Villanueva (Harvard University)
 - o Dr. Suvi Gezari (Space Telescope Science Institute)

Stellar Research:

- The Enigmatic Symbiotic System MWC560 (V694 Mon)
 - o Ariel Mora (Bennington College)
 - o Dr. Hugh Crowl (Bennington College)
 - o Gary Walker (MMO)
 - o Dr. Regina Jorgenson (MMO)



MMO Research Fellow Jay Chittidi (September, 2019 - August, 2020)

The Nantucket Maria Mitchell Association is proud to establish collaborations with other non-profit organizations, businesses, and universities in order to offer the best in programs and to conduct research vital to understanding and preserving Nantucket's natural areas and history, and to pursue cutting edge research in astronomy using the MMA's telescopes and leading telescopes around the world and in space.

ACKlimate	Massachusetts Division of Marine Fisheries
American Astronomical Society	Massachusetts Institute of Technology
American Association of Variable Star Observers	Massachusetts Space Grant Consortium
Artists Association of Nantucket	MeeRTRAP (more TRAnsients and Pulsars)
Bennington College	Monomoy Charters
Boston University	Montessori Children's House of Nantucket
Bridgewater State University	Nantucket Atheneum
Cape Cod 5 Foundation	Nantucket Biodiversity Initiative
Cape Cod Museum of Natural History	Nantucket Boys and Girls Club
Chandra X-Ray Center, Center for Astrophysics Harvard & Smithsonian	Nantucket Chamber of Commerce
City University of New York	Nantucket Community Sailing
Columbia University	Nantucket Community School
Committee on the Status of Women in Astronomy	Nantucket Community Television
Connecticut College	Nantucket Conservation Foundation
Consortium of Northeastern Herbaria	Nantucket Girl Scouts
CRAFT (The Commensal Real-time ASKAP Fast Transients Survey)	Nantucket Historical Association
Egan Maritime Institute	Nantucket Islands Land Bank
European Southern Observatory	Nantucket Land Council
Fast and Fortunate for FRB Follow-up (F4)	Nantucket Lighthouse School
Gran Telescopio Canarias	Nantucket Preservation Trust
Great Harbor Yacht Club	Nantucket Public Schools
Harvard University	Nantucket Shellfish Association
Harvard University Museum of Comparative Zoology	Nantucket Shipwreck & Lifesaving Museum
Hunter College CUNY	National Collaborative of Women's History Sites
International Astronomical Union	National Informal STEM Education Network
Jason Bridges, Nantucket Bike Tours	National Museum of Natural History
Johns Hopkins University	National Research Council of Canada
Josh Eldridge, "Crittter Cruises"	Northwestern University
Kavli Institute for the Physics and Mathematics of the Universe (IPMU)	Pontificia Universidad Católica de Valparaíso
Keck Observatory, University of Hawai'i	Preservation Institute Nantucket
Linda Loring Nature Foundation	Prospect Hill Cemetery Association
Mark Genthner, Just Do It, Too	realfast (real-time fast transients at the VLA)
Marine Biological Laboratory	Roger Williams Park Zoo
Massachusetts Audubon Society	Rotary Club of Nantucket
	'Sconset Trust
	Shearwater Excursions
	Space Telescope Science Institute
	Specify Collections Consortium
	Temple University

Town of Nantucket
 Town of Nantucket Natural Resources
 Department
 The Trustees of Reservations
 Tuckernuck Land Trust
 Tupancy-Harris Foundation of 1986
 UMass Boston Nantucket Field Station
 University of California, Santa Cruz
 University of Colorado, Boulder

University of Copenhagen, Denmark
 University of Granada, Spain
 University of Hawai'i
 U.S. Fish and Wildlife Service
 Wellesley College
 Woods Hole Oceanographic Institute
 Vassar College
 Yale University



Publications

Astronomy

Aditya, J. N. H. S., *Jorgenson, R. A., Joshi, V., Singh, V., An, T., & Chandola, Y., "uGMRT detection of associated H I 21-cm absorption at $z3.5$," 2020, MNRAS, 500, 1, 998.

Simha, Sunil, et al. (including *Chittidi, J. S. and *Jorgenson, R. A.), "Disentangling the Cosmic Web toward FRB 190608" 2020, Astrophysical Journal, 901, 134.

Littlefield, C. et al. (including *Walker, G.), "The Rise and Fall of the King: The Correlation between FO Aquarii's Low States and the White Dwarf's Spin-down" 2020, Astrophysical Journal, 896, 116L.

*Chittidi, J. S., Simha, S. H., *Jorgenson, R. A., et al. "Disentangling the Source of a $z=0.11$ Fast Radio Burst (FRB) Dispersion Measure (DM)" 2020, American Astronomical Society Meeting Abstracts #235, #208.03.

*Ealy, J. "A Multi-Epoch X-Ray Study of Star Formation in IC 348" 2020, American Astronomical Society Meeting Abstracts #235, #110.21.

*Massoud, A. A., King, L. "Identifying Strong Lensing Images in the Unusual Merging Cluster Abell 2146" 2020, American Astronomical Society Meeting Abstracts #235, #303.02.

*Mintz, A., *Jorgenson, R. A., Rafelski, M. "Probing the High-Redshift Circumgalactic Medium (CGM) Through Quasar Absorption Line Tomography" 2020, American Astronomical Society Meeting Abstracts #235, #205.06.

*Mulcahey, C. R., Prichard, L. J., *Jorgenson, R. A. "Deciphering the Origin of Ionized Gas in IC 1459 using VLT/MUSE" 2020, American Astronomical Society Meeting Abstracts #235, #207.17.

*Olvera, R. R., Montez, R., Castro, D. "Median Energy Imaging of Supernova Remnants in the Magellanic Clouds" 2020, American Astronomical Society Meeting Abstracts #235, #276.11.

*Stolle-McAllister, G., Muirhead, P., *Walker, G., Han, E., *Jorgenson, R. A. "Investigating an Activity Cycle on Eclipsing Binary Star FL Lyr" 2020, American Astronomical Society Meeting Abstracts #235, #170.28.

*Walker, G. E. "Will sCMOS replace CCD's for Astronomy?" 2020, American Astronomical Society Meeting Abstracts #235, #175.01.

* Indicates MMO affiliated author

History

Publications by: Jascin N. Leonardo Finger

American Astronomical Society online article for column of Historical Astronomy Division. "This Month in Astronomical History: America's First Woman Astronomer: Maria Mitchell." August 2020.

Woods Hole Oceanographic Institution: Online article and exhibit and plaque text for room dedication at WHOI in memory of WHOI biologist and founder of modern oceanography, Mary Sears.

Presentations

Maria Mitchell Women of Science Symposium Closing Remarks, October 2, 2020, Jascin N. Leonardo Finger.

"Lovely Oceans," MMA Science Speaker Series, June 3, 2020, Jack Dubinsky.

"Strange Extragalactic Signals: E.T. or Something Natural?," Linda Loring Nature Foundation Science Pub, April 13, 2020, Jay Chittidi.

"Learning from Star Shadows: Investigating an Activity Cycle on Eclipsing Binary Star FL Lyrae," Kenyon College Thesis Defense Presentation, May 14, 2020, Georgia Stolle-McAllister.

"Strange Signals and a Cosmic Conundrum: Using Fast Radio Bursts to Uncover the Universe's Hidden Matter," MMA Science Speaker Series, June 24, 2020, Jay Chittidi.

"Why We're Shutting Down STEM: A Movement to Fight Racism in Academia," June 12, 2020, Jay Chittidi, Molly Zegans, Regina Jorgenson.

"Maria Mitchell Association Celebrates International Observe the Moon Night," September 28, 2020, Georgia Stolle-McAllister and Regina Jorgenson.

"Pushing the Envelope with sCMOS," AAVSO meeting on Instrumentation, September 26, 2020, Gary Walker.

National Science Foundation Research Experiences for Undergraduates (NSF-REU) Intern Presentations, August 5, 2020, Devon Barros, Kiana Burton, Sarah Graber, Alex Granados, Andrea Mejia, Natalia Villanueva (See page 6.)

Awards

Alexandra Mannings (MMO 2019), participant in the Fast and Fortunate for FRB Follow-up (F4) collaboration as a graduate student at U.C. Santa Cruz, was awarded a prestigious National Science Foundation Graduate Research Fellowship.

Kiana Burton (MMO 2020, Temple University) was awarded the prestigious Chambliss Astronomy Achievement Award for her research presentation entitled "First Millimeter Flares Detected from Epsilon Eridani with ALMA" and completed under the guidance of Dr. Meredith MacGregor (MMO 2009).

A black silhouette of the Nantucket skyline is positioned at the bottom of the image, spanning the entire width. It includes a windmill on the left, several buildings of varying heights, and a prominent dome on the right side.

4 Vestal Street
Nantucket, MA 02554
508-228-9198
mariamitchell.org