12-1-2020

Progression Magazine, 2020 Winter

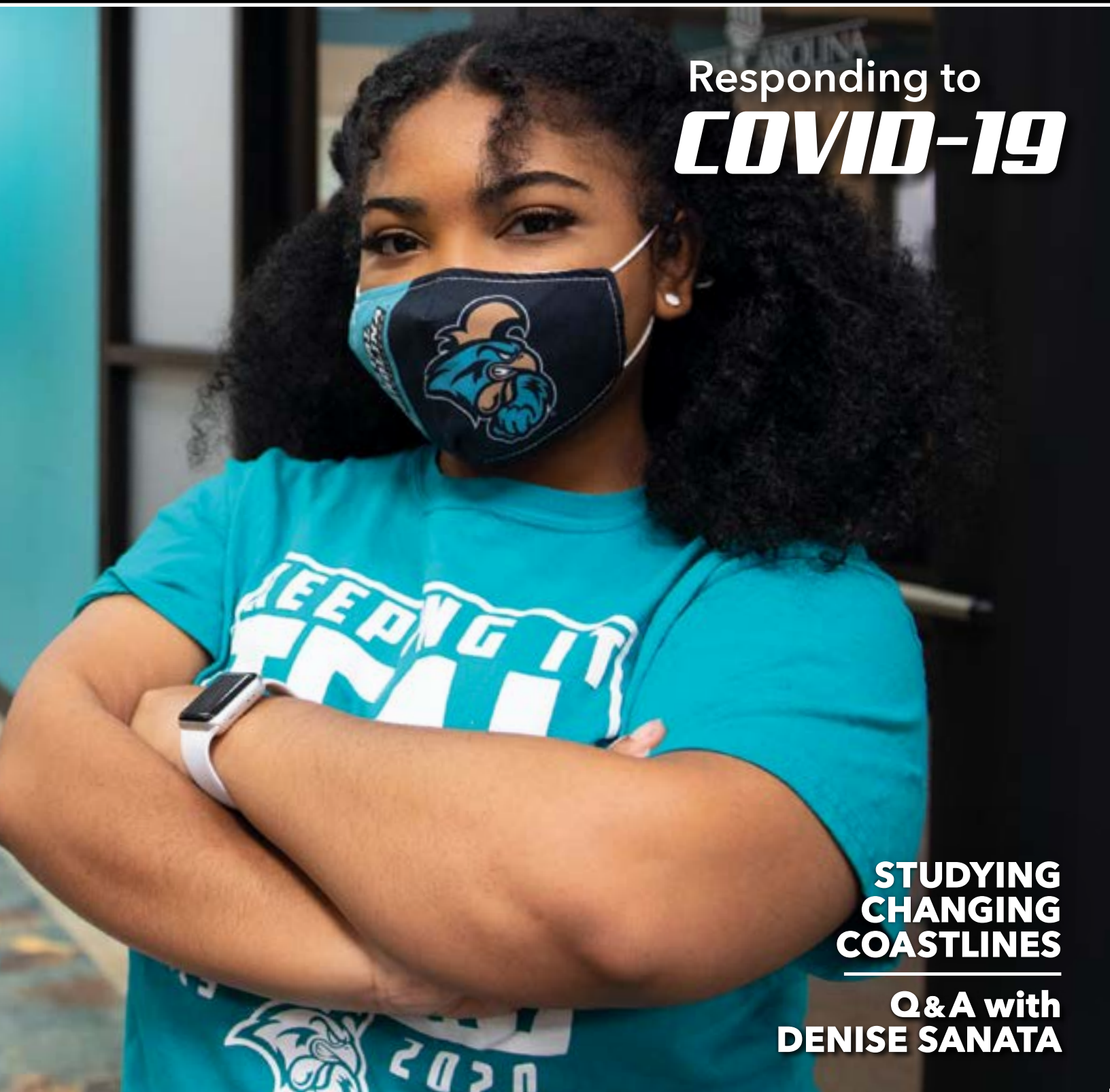
Coastal Carolina University

COASTAL CAROLINA UNIVERSITY

progression MAGAZINE

WINTER 2020

KEEPING UP WITH THE EDUCATIONAL MOMENTUM OF THE GUPTA COLLEGE OF SCIENCE



Responding to COVID-19

STUDYING CHANGING COASTLINES

Q&A with DENISE SANATA

progression

A message from the dean

In this issue of Progression, the magazine of the Gupta College of Science at Coastal Carolina University, we highlight some of our responses to the COVID-19 pandemic. Our faculty (and students) rose to the occasion and have performed extremely well as we sought to maintain our educational rigor in a challenging environment. We focus on three main issues: the University response; the college response; and the student response. I think these three articles will give you a good sense of the resilience of YOUR college and University.

We also provide a glimpse into what happens during the advising process through an interview with one of our first-year advisors. Further, you will find an article about how coastal regions and coastlines are changing.

Should you have any questions about our science programs, or want more information on any of the articles, please do not hesitate to contact me or the specific authors – my phone number and email are listed below; you can also follow me on Twitter at @CCUScienceDean.

Michael H. Roberts, Ph.D.
Dean, Gupta College of Science
Vice President for Emerging Initiatives
mroberts@coastal.edu
843.349.2282

ALUMNI INFORMATION
coastal.edu/alumni

PHILANTHROPY INFORMATION
coastal.edu/endowment

PROGRESSION MAGAZINE
James Luken, Ph.D.
Editor and Associate Dean
Gupta College of Science

GUPTA COLLEGE OF SCIENCE AT COASTAL CAROLINA UNIVERSITY
coastal.edu/science

COASTAL CAROLINA UNIVERSITY
P.O. Box 261954
Conway, SC 29528-6054

progression contents

02 **Departments** and **Chairs**

04 Responding to **COVID-19**

12 Changing **COASTlines**

16 Q & A **DENISE SANATA**

18 **Research** and **Publications**

20 **President's Honor List**

24 **Dean's Honor List**

DEPARTMENT OF BIOLOGY

John Hutchens, Ph.D.
Department Chair

The Department of Biology is home to about 500 undergraduate biology majors, 10 graduate students, 15 full-time faculty, and 10 lecturers. Undergraduate students earn a Bachelor of Science in biology. We also offer other programs of study that prepare students for entry into various health professions. Our department participates in the Master of Science in coastal marine and wetland studies and offers courses for graduate students in education.

Students have access to professors with expertise ranging from molecules to ecosystems. Faculty provide excellent opportunities for learning inside the classroom and out. Our faculty have varied research interests, and undergraduates can participate in that research.

Visit coastal.edu/biology.
John Hutchens can be reached at jjhutche@coastal.edu or 843.349.2169.

DEPARTMENT OF KINESIOLOGY

Gregory F. Martel, Ph.D.
Department Chair

The Department of Kinesiology at CCU is a dynamic unit of faculty, staff, and students who study and promote human movement (kinesiology) as applied to a variety of physical activity, sport, and therapeutic settings. The department houses a major in exercise and sport science (EXSS), minors in EXSS and sport coaching, Physically Active Living Skills (PALS) classes, and Community Fitness Testing program. Nationally, regionally, and locally, there has been an increase in demand for kinesiology-related services and programs; this is reflected in the rapid growth of the EXSS major since beginning at CCU in January 2008. The EXSS major is now the third largest on campus. Our role is to provide students with the knowledge, skills, abilities, and attitudes for effective leadership in the field of kinesiology. We excel by providing quality teaching and by engaging students in hands-on research, community service projects, and field-based learning and leadership opportunities.

Visit coastal.edu/knes.
Greg Martel can be reached at gmartel@coastal.edu or 843.349.2957.

DEPARTMENT OF CHEMISTRY

Paul Richardson, Ph.D.
Department Chair

Our department offers two Bachelor of Science degrees: chemistry and biochemistry. Our students often work with faculty on various chemistry research projects. Whether you are here for a course in science as part of the Core Curriculum or you are interested in becoming a chemistry or biochemistry major, please contact us with any questions.

Visit coastal.edu/chem.
Paul Richardson can be reached at prichar@coastal.edu or 843.349.2598.

DEPARTMENT OF HEALTH SCIENCES

Fredanna M'Cormack McGough, Ph.D.
Department Chair

The Department of Health Sciences is home to programs that incorporate evidence-based best practices for disease prevention, health assessment, health management, quality care, and patient safety. Through community collaborations and diverse faculty research interests, students can participate in research activities that connect theory to practice. The department offers Bachelor of Science degrees in public health, health administration (completion program), and nursing (2+2 Nursing Residential program and RN-to-BSN completion program). The 2+2 Nursing Residential program is a collaborative between CCU and Horry-Georgetown Technical College and is for first-time freshmen only.

The nursing completion program is committed to advancing the education of registered nurses to meet the local and global growing health care needs. The health administration completion program builds on foundation courses in associate degree and other four-year degree programs. The public health program focuses on the art and science of promoting healthy communities and healthy behaviors.

Visit coastal.edu/healthsciences.
Fredanna M'Cormack McGough can be reached at fmcorma@coastal.edu or 843.349.2991.

DEPARTMENT OF COMPUTING SCIENCES

Jean French, Ph.D.
Department Chair

The Department of Computing Sciences offers three undergraduate degrees, serving roughly 400 actively enrolled majors in computer science, information systems, and information technology. The department offers minors in web application development, scientific computing, and computer science. Both the computer science and information systems major programs are accredited by the Accreditation Board for Engineering and Technology Inc. The department also offers a completely online Master of Science in information systems technology, which has a dual concentration in both security and data analytics. The department supports the University Core Curriculum and other majors and minors of study with course offerings in web development, programming, and business applications.

Visit coastal.edu/computing.
Jean French can be reached at jennis@coastal.edu or 843.234.3430.

DEPARTMENT OF SOCIOLOGY

Robert Jenkot, Ph.D.
Department Chair

This is an exciting time to explore the Department of Sociology. Sociology has a strong history of being student-centered in teaching and research. We offer our students a wide variety of educational opportunities to explore the social world and to take part in changing that world. In order to maintain our student-centered approach to education, all of our professors are active researchers. We bring our experience with various topics into the classroom so that our students get to see what sociology is, how it works, and what it can be used for in the world around them. Importantly, our students are invited to work with our professors on research projects that interest them. Our students have access to professors who teach courses in: sexuality and gender; race and ethnic relations; social inequality; crime and deviance; religion; popular culture; social justice; health and medicine; sports; HIV/AIDS; juvenile delinquency; and the social relations of the South.

Visit coastal.edu/sociology.
Robert Jenkot can be reached at rjenkot@coastal.edu or 843.349.2274.

DEPARTMENT OF MARINE SCIENCE

Craig Gilman, Ph.D.
Department Chair

The Department of Marine Science offers one of the largest undergraduate marine science programs on the East Coast. In addition to undergraduate studies, the department houses the Coastal Marine and Wetland Studies master's program and the Marine Science: Coastal and Marine Systems Science doctoral program. Lecture, laboratory, and field experiences are integrated to provide students with an outstanding and well-rounded education. With our ideal location near the coast and collection of research-active faculty committed to undergraduate and graduate education, our strength is in providing individual attention and hands-on opportunities.

Visit coastal.edu/marine.
Craig Gilman can be reached at gilman@coastal.edu or 843.349.2228.

DEPARTMENT OF RECREATION AND SPORT MANAGEMENT

Colleen McGlone, Ph.D.
Department Chair

The Department of Recreation and Sport Management enrolls more than 300 students as well as houses a graduate program in sport management. Recreation and sport management professionals create, plan, market, implement, and evaluate leisure and recreational activities in both the private and public sectors, as well as in both nonprofit and for-profit industries. In other words, our work is your play. The program works with the CCU Department of Athletics in several capacities and events, training students in specialized ticketing technology and sales techniques.

The faculty have a wide range of experience in the field, which they bring to the classroom to enhance students' abilities to connect theory and practices. In addition, faculty maintain very active research agendas in which students frequently assist.

Visit coastal.edu/rsm.
Colleen McGlone can be reached at cmcglone@coastal.edu or 843.349.2989.

DEPARTMENT OF PSYCHOLOGY

Andrew Terranova, Ph.D.
Department Chair

The Department of Psychology enrolls more than 500 undergraduates. We offer a Bachelor of Science degree and emphasize the scientific nature of psychology and experimental research methods. Our 13 full-time faculty have expertise in a wide variety of areas, including experimental, social, developmental, cognitive, biological, school, and clinical psychology. Our faculty are excellent teachers and active researchers in the field, presenting at conferences, contributing articles and books to the research literature, and sharing their findings and expertise with the media. Through our research methods sequence, students gain extensive knowledge and experience by designing and conducting research. Motivated majors may find additional opportunities to join faculty research labs as research assistants.

Visit coastal.edu/psych.
Andrew Terranova can be reached at terranova@coastal.edu or 843.349.4034.

DEPARTMENT OF MATHEMATICS AND STATISTICS

Thomas Hoffman, Ph.D.
Department Chair

The goal of the Department of Mathematics and Statistics is to improve students' mathematical understanding and competence. However, we also strive to illustrate the importance of mathematics, both as an interesting and challenging subject on its own, and as a tool that can be applied to other disciplines. Our two degree programs (applied mathematics and statistics) are designed to develop a high degree of mathematical proficiency, as well as extensive reasoning and problem-solving skills. We recognize the interdisciplinary nature of the modern mathematical world. Therefore, students may choose to concentrate their studies in analysis, applied mathematics, discrete mathematics, mathematics for secondary education, or statistics while still obtaining a solid mathematical background.

Visit coastal.edu/math.
Tom Hoffman can can be reached at thoffman@coastal.edu or 843.349.2249.

DEPARTMENT OF PHYSICS AND ENGINEERING SCIENCE

G. Wesley Hitt, Ph.D.
Department Chair

The Department of Physics and Engineering Science faculty and staff create an atmosphere of learning and scholarly work, applying the scientific method from a liberal arts approach. The faculty is committed to developing strong student competencies in physical and engineering science and its applications in a technology-rich, interactive, student-centered learning environment and to preparing students to successfully compete for employment or to succeed in graduate school. We take pride in our high-quality teaching using current pedagogic techniques, our proactive mentoring and advising, and our outreach to the local community. We strive to be a focal point for disciplinary scholarship and expertise within the college, and to collaborate with our colleagues in the college to actively contribute to the advancement of science. The faculty supports the goals of the University's Core Curriculum through general education courses in physics and astronomy.

Visit coastal.edu/phys.
Wes Hitt can be reached at ghitt@coastal.edu or 843.349.4047.


CAROLINA
2020

Responding to COVID-19

Fall 2020 posed many challenges for faculty, staff, and students. But many of the challenges became opportunities.

THE GUPTA COLLEGE OF SCIENCE

RESPONDS

*by **James O. Luken, Ph.D.**, associate dean, Gupta College of Science*

Angelos Hannides, an assistant professor in the Department of Marine Sciences, producing a laboratory procedure video.

Delivering valuable and relevant science education within the confines of 50-minute lectures and three-hour laboratories is a challenge even when facilities are perfect and students are present. When Gupta College of Science faculty learned that the return to campus in Fall 2020 would likely involve widespread remote learning due to the novel coronavirus, they knew that this would be a unique challenge but also perhaps an opportunity to leverage some distance learning approaches already in use.

Before the virus hit, student lab or field experiences typically involved 15-24 students, often working together on group projects. Unfortunately, the coronavirus greatly restricted the gathering of students in groups, and some augmentation of these lab and field experiences was needed. Angelos Hannides, an assistant professor in the Department of Marine Science, quickly adapted his smart phone video and livestreaming skills and began producing content for student consumption.

"The quality of the product is more than sufficient and the technology can fit in one's pocket, a development unthinkable a few years ago," says Hannides. While Hannides was a first adopter of teaching lab skills via videos and streaming, he still prefers hands-on teaching and hopes that "this will be an opportunity to show society why in-person science training is so important."

Science faculty quickly recognized the need for multiple distance learning platforms and technologies, creating a steep learning curve at the beginning of the semester. "I have used Moodle for discussion forums, assignments, and tests, Screen-Cast-O-Matic to record lectures, Zoom for small group and individual student meetings, Moodle messaging to encourage students, and also

> The virus has provided an opportunity for a higher education reboot, giving faculty the creativity and freedom to examine innovative ways to engage students."
>
> –*Sharon Thompson*
> *Professor, Health Sciences/Public Health Program; Coordinator, Swain Scholars*

text messaging and phone calls," say Sharon Thompson, a professor in the Department of Health Sciences. Her experience so far has been positive, and she thinks other faculty share this opinion. The virus has "provided an opportunity for a higher education reboot, giving faculty the creativity and freedom to examine innovative ways to engage students."

The transition to remote learning at Coastal Carolina University was facilitated by a bulk purchase of iPads and iPad stands with distribution within the Gupta College of Science managed by Prashant Sansgiry, associate dean. These devices allowed faculty to livestream lectures, labs, and even some field activities.

A final assessment of how the Gupta College of Science responded to the social restrictions imposed by the coronavirus is not complete, but there are some interesting and potentially positive outcomes. First, science faculty learned that good science teaching in a remote learning environment requires variety. "We can no longer be fixed in one method of teaching, but must embrace many different methods as the situation dictates," said Paul Richardson, professor in the Department of Chemistry. Students also may be learning in new and different ways. Thompson thinks that "online education encourages students to take more personal responsibility for the learning process."

Regardless of when the coronavirus pandemic ends, it is clear that science and science education are more important now than at any time in history. It is critical that science participation be broad and that science support be deep. The Fall 2020 Semester showed that scientists in the Gupta College of Science are flexible and adaptable in their approaches to teaching and research. This is a good sign for the future as "universities (and students) that are able to effectively handle remote technologies will thrive," says Michael Roberts, dean of the Gupta College of Science.

Rich Viso (top)*, professor in the Department of Marine Science, and Paul Richardson* (above)*, professor in the Department of Chemistry, teach labs during the Coastal Comeback.*

COASTAL CAROLINA UNIVERSITY ***RESPONDS:***

Q&A WITH

CARISSA MEDEIROS

COASTAL **COMEBACK**

Carissa Medeiros, CCU emergency management director, answers some questions about the campus reopening in Fall 2020.

Q. What was the biggest challenge in preparing CCU for the return of students in Fall 2020?

A. The biggest challenge in preparing the University for the return of students in Fall 2020 was the unknown. There were no best practices for responding to a pandemic caused by a novel virus without therapeutics or a vaccine. The coronavirus didn't fit into a predefined scenario or pandemic plan. The CDC guidance was changing constantly (and continues to do so) and no one, not even public health experts, could say what the situation would look like days, weeks, or even months later.

Q. How did you address this challenge?

A. To address the challenge of the unknown, we instituted what we did know, what we were confident in when it comes to emergency/disaster response and planning. The University has successfully responded to and recovered from multiple large-scale incidents and six presidentially declared disasters since 2014. We instituted what had worked with previous disaster responses and recovery efforts, yet remained flexible in our approach, planning, and response. The CCU Emergency Operations Framework serves as the University's guide for responding to large-scale emergencies and disasters, and provides the emergency operations organization. The concept of operations and organization served as the foundation for COVID-19 response and planning efforts. During emergency responses, we use a functional approach to coordinate resources and provide strategic direction through the Emergency Operations Center. These functional areas were utilized as the basis for the COVID-19 Reopening Planning Team. We expanded the functional areas to include non-traditional emergency response functions such as academics, athletics and recreation, international students and programs, etc. I also adopted some hazard mitigation planning processes to guide the action planning process for the committees. Each committee performed an impact assessment – not on how COVID-19 would impact their areas, but how the COVID-19 Prevention and Mitigation Standards impacted their areas/activities (6-ft. physical distancing, face coverings, etc.). This approach gave us the ability to plan for the "known" instead of the "unknown," keeping in mind that we must remain flexible.

Q. How are we monitoring and managing the pandemic on campus?

A. We are monitoring the campus community spread and impacts of the pandemic on campus, in the surrounding communities, and the region. The COVID-19 Transition Advisory Group established specific metrics criteria where data would be collected, monitored, and assessed to determine the level of risk and trends on campus. The data provide snapshots of the impact of COVID-19 and are also used to develop weekly and biweekly risk assessment and progress trends. The Group meets weekly to review the data, assess the COVID-19 risk level on campus, and review and interpret strides made to maintain low levels of cases on campus. The COVID-19 Transition Advisory Group produces a biweekly Risk Assessment and Gating Criteria Report for the Emergency Management Executive Group.

We are managing the pandemic with two distinct yet overlapping missions: preventing/mitigating community spread on campus, and responding to the impacts of COVID-19.

Carissa Medeiros, CCU emergency management director.

Prevention and Mitigation: In June 2020, then-President David A. DeCenzo and the Emergency Management Executive Group adopted the COVID-19 Standards, proposed by the COVID-19 Task Force, which define the campus public health prevention and mitigation measures to prevent/mitigate community spread. The COVID-19 Reopening Planning Team (now known as the COVID-19 Operations Planning Team) then developed functional area action plans detailing the strategies or solutions to implement the prevention and mitigation measures on campus for Phase One. The COVID-19 Operations Planning Team committee chairs continue to meet weekly, assessing the Phase One action plans and updating processes and/or procedures as new guidance is released. Phase Two transition planning is underway.

Response: The University has also adopted testing and infection containment measures as part of its COVID-19 Standards, however, they are only deployed in response to a potential or actual campus case of COVID-19 and resulting potential exposures on campus. This includes symptomatic viral COVID-19 testing provided by Student Health Services, contact tracing and cluster investigations, COVID-19 case management services, and resident student quarantine and isolation operations.

Q. What changes do you see for the future?

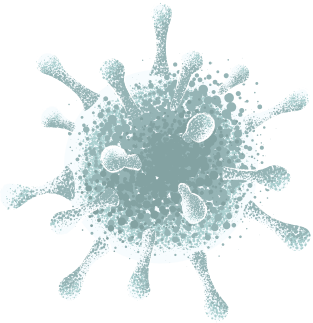
A. At this point, I cannot predict or make assumptions on the changes for the future because I believe our biggest challenge of the unknown will remain. As with any novel virus, scientists will make discoveries that will result in changes to the CDC guidance. Even with the promise of a vaccine and new therapeutics, we must keep in mind that these important steps are also new, so the challenge of the unknown continues. I am, however, sure of one thing: the resiliency of our students, faculty, and staff. All of the planning that has taken place wouldn't have been successful without the coordination and collaboration of faculty and staff. As we work through this fluid situation, we will continue to recognize that our success as an institution is dependent on our individual responses.

CCU RESPONDS WITH COVID-19 STUDENT TESTING ON CAMPUS:

Testing of students, faculty, and staff continues at CCU in an effort to track and manage any new COVID-19 clusters.

COASTAL COMEBACK

SCAN
TO WATCH COASTAL COMEBACK VIDEOS.



IMPORTANT LESSONS FROM COVID-19

*by **JongHan Kim, Ph.D.**, associate professor, Department of Psychology*

We had the Democratic National Convention last week, and the Republican National Convention is going on this week until Thursday. On YouTube, you can find many political speeches supporting either party. Choose one speech that you like. Briefly summarize the speech. What were at least three points the speaker emphasized? If you had been that speaker, what would you have said differently? Defend your opinions.

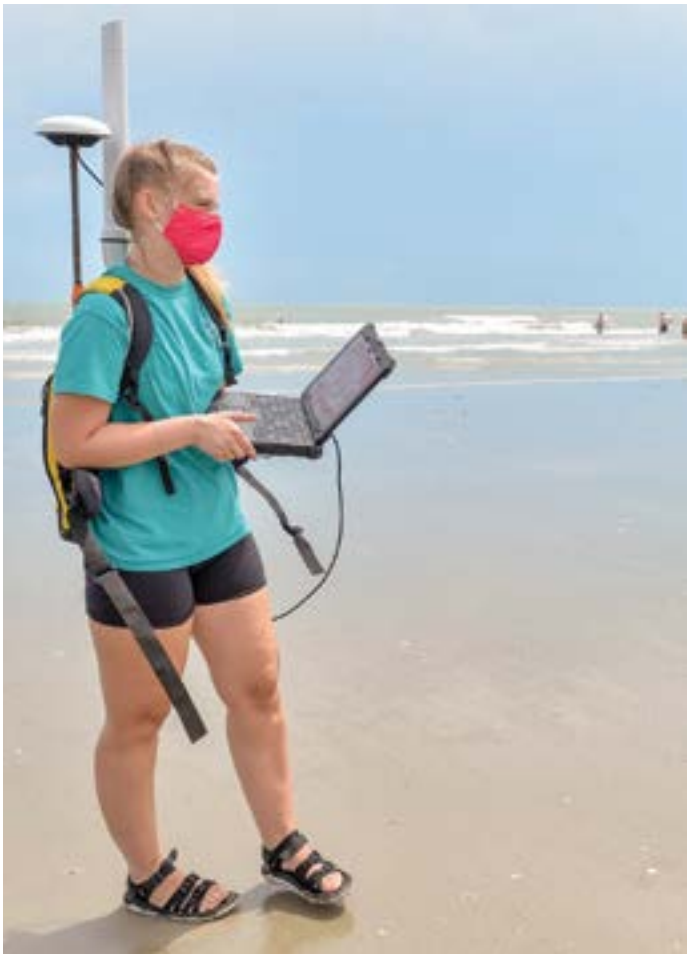
That was one of two topics students in my social psychology class could have chosen to write about. When I prepared the question about the political conventions, I thought that it would make a fascinating subject for most students. I was wrong. No one chose this topic and all 32 students instead chose a second topic: COVID-19 impacts.

In this short essay, I report what my students said about COVID-19 and how it is affecting the lives of college students. The questions about COVID-19 had four parts:

1. ***How has COVID-19 changed your life?***
2. ***Discuss two positive ways COVID-19 has affected you.***
3. ***Discuss two negative ways COVID-19 has affected you.***
4. ***How has COVID-19 changed the way you are perceiving and preparing for your future?***

The following summarizes their responses: COVID-19 is dramatically changing the lives of college students. Their most obvious priorities have become self-care and personal hygiene. They now also have a new behavioral norm – social distancing. "I cannot go into the doctor's office with a loved one when they need me." "I cannot go into the vet's office with my new puppy, who is terrified of the vet, and does not know why her mom is leaving her." "The worst was the passing of my neighbor's mother, whom I had known since the age of 4. It was hard to watch her go from a distance. At that time in New Jersey, only two people at a time were allowed to go to a funeral." They can no longer honor and support even those most dear to them. They missed visiting their grandparents.

On a personal basis, students have discovered ways to make the best of a bad situation. Whereas they forgo many activities, the time spent apart from



Wearing masks, physical distancing, and plexiglass dividers are the new norm for helping to keep the campus community safe at CCU.

others also enables them to reflect upon their lives and their goals, to come to terms with their new limitations, and to assess or revise their future plans. They have begun to appreciate more what they have long taken for granted, such as having a meal inside a restaurant, going to movies, and traveling around the country and abroad. Many students have picked up new hobbies, such as cooking, painting, reading, home improvement, etc. They relish the extra time with their family, and they are reconnecting with old friends.

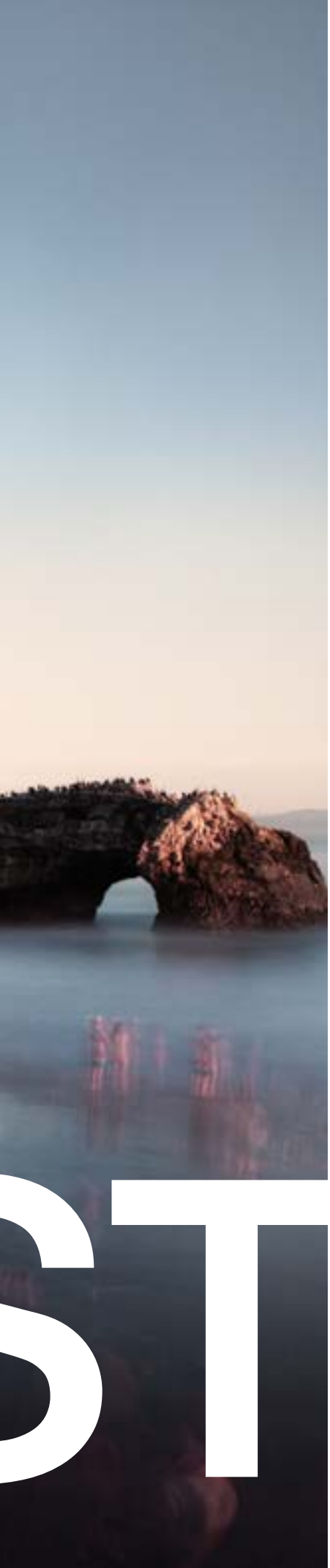
Many students report becoming more independent and organized. They have become more future-oriented. They have realized that societies can change abruptly, and they need to replace worry with patience, persistence, and planning for the future.

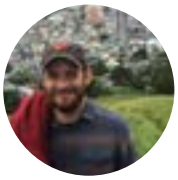
"I communicate with my friends through social media or by texting or FaceTiming. At first it was okay, but eventually I got tired of not being able to see other people." Clearly, something significant – physical contact, comfort – is missing from online communications.

As for their education, students prefer face-to-face instruction. They don't want to sit with a computer in a room. In addition, students like to go on campus because that's where their social life is located. Many students, however, are quick to point out that online learning has its benefits. For example, it gives them greater flexibility in managing their time. They establish more efficient work routines, improve their productivity, and enjoy extra discretionary time. Apparently, they seem to adapt quickly to the use of the various educational channels. Unfortunately, online learning does not come with a stable learning environment. Learners may set up anywhere – a bedroom, kitchen table, or café. As a result, the student may struggle against many distractions and temptations, such as watching TV, napping, etc.

As I reviewed my students' responses to this assignment, I learned how much and in what ways COVID-19 is affecting their lives and future. I was reminded of Albert Einstein's words to his son, Eduard, who was going through a difficult time. Einstein wrote, "Life is like riding a bicycle. To keep your balance, you must keep moving." I applaud students who continue to move forward, to make plans, to adapt to circumstances, to remain upright against the headwinds of social change. For them, that bicycle Einstein was talking about is the human spirit—our best hope for constructing a better future.


Changing
COAS





Story and photos by **Patrick Limber**, Ph.D.,
assistant professor, Department of Marine Science

Growing up, I spent each year in eager anticipation of a single, fun-filled week: our family vacation to the beach. The beaches of Brunswick County, N.C., were our usual destination – a temporary home away from home – where we would spend the days swimming, collecting sea shells, playing mini-golf, and watching the summer sunset dip lazily behind the salt marsh cordgrass.

Every day during our vacation, the beach looked slightly different. Tides diligently rolled the shoreline across the beach; sand bars shifted to-and-fro; and waves were large and energetic during storms, and small and docile during fair weather. To me, this daily unpredictability – and impermanence – made the beach exciting and unique. Unlike fast-changing beaches, many other processes that shape the surface of the Earth are imperceptibly slow. Tectonic plates, for example, creep along at roughly the same speed that your fingernails grow. Mount Everest – the tallest mountain in the world – was formed by tectonic forces thrusting the landscape gradually upwards by a fraction of an inch each year. But beaches are different. They are geologic cheetahs, and can change dramatically within hours in response to waves, storms, and tides.

A summer evening on Natural Bridges State Beach, Santa Cruz, Calif.

lines

Worldwide, up to 630 million people may be vulnerable to sea level rise-related flooding during the 21st century.

Students exploring oceanfront homes threatened by beach erosion in North Topsail Beach, N.C. (right).

Persistent beach erosion at Ocean Isle Beach, N.C., poses a hazard for oceanfront homes (far right).

Apartments on the edge of an eroding coastal cliff in Isla Vista, Calif., near Santa Barbara. (below).

Impermanence is part of what makes the beach so unanimously appealing. In the U.S., between 1970 and 2010, the population of oceanfront counties grew by 39%, and growth is expected to continue. Globally, population density is significantly higher in the coastal zone compared to inland areas. In China, for example, population growth in coastal urban areas outpaces the national average population growth by nearly 200%. But, the same alluring impermanence that drives coastal population growth also makes the beach a risky place to live: the beach and ocean water levels are constantly changing and exposing homes, hotels, roads, and other infrastructure to flooding from waves, tides, and storms. Along the East and Gulf coasts, hurricanes – Hazel, Katrina, Florence, and Harvey, to name a few – have caused the U.S.' costliest natural disasters, in part because the coastal zone is so densely populated, developed, and vulnerable. On top of population growth, oceanfront homes are also growing larger, even in places that have experienced major hurricane impacts in the past. This perplexing trend of 'building back bigger' after homes are destroyed or damaged by hurricanes further increases the risk to coastal property from future storms.

In addition to growing coastal populations, climate change is causing global sea level to steadily rise. By 2100, nearly half of the world's beaches may be 100 meters further inland than where they were in 2010. While the landward migration of the shoreline – also called erosion – will probably shorten the walk from your vacation home to the ocean, sea level rise combined with a growing coastal zone population poses a significant problem. Worldwide, up to 630 million people may be vulnerable to sea level rise-related flooding during the 21st century. Low-lying areas, such as those along the U.S. East and Gulf coasts, are particularly at risk, including New York, Boston, Miami, and New Orleans. Rising seas mean that the elevation of low tide and high tide will continually shift upwards. Think of it like a toy boat bobbing up and down in a bathtub as the tub gradually fills with water: the upward and downward bobs, like high and low tides, move higher as the tub fills – or as sea level rises. In Boston and New York, sea level has risen nearly a foot during the past 100 years. High tides – the natural daily upward bob of the ocean – now reach a foot higher than they used to, bringing the ocean closer and closer to people and infrastructure. With rising seas, storms

are no longer a prerequisite for coastal flooding: high tides alone can cause minor daily floods by overtopping barriers or rising up through ocean-connected storm drains. In the U.S., high tide 'nuisance flooding' occurs twice as often today as it did just 30 years ago.

On the U.S. West Coast, the San Andreas Fault – famous for its recurrent earthquakes, like the great San Francisco quake of 1906 and the Loma Prieta quake of 1989 – zigzags through California like a geologic zipper, separating two tectonic plates. As the plates move relative to each other, earthquakes are triggered, and the land is slowly squeezed upwards to form coastal mountain ranges, such as Big Sur and the Santa Monica Mountains near Malibu. As a result, steep rocky coastal cliffs line the coast, providing higher elevations (relative to the East Coast) for people and property, in many cases beyond the watery grasp of high tides and rising seas. While higher elevations help offset the immediacy of sea level rise impacts in California, other unique problems exist: rising seas are accelerating thelandward movement of coastal cliffs, and beaches. In Los Angeles, San Diego, and Santa Barbara, by the year 2100, coastal cliffs could retreat landward by as much as 62 to 135 feet, and up to two-thirds of Southern California's famous beaches may be lost, impacting between $90 billion and $150 billion of property and roughly 600,000 people.

To prepare for our warming future, scientists need to better understand how sea level rise and storm impacts will affect the coastal zone. At Coastal Carolina, research on beach behavior, erosion, and flooding is underway. Undergraduate students are measuring marsh erosion caused by boat wake along Myrtle Beach's Intracoastal Waterway, for example, and assessing the effectiveness of beach nourishment – the practice of pumping sand onto the beach to slow down coastal erosion – using global satellite imagery. We are also working with the U.S. Geological Survey to predict the response of California's coastal cliffs to rising seas, and providing our findings to the general public.

On your next vacation, look beyond the sun, sand, and surf. The beach is a comforting place to unwind, but it is also an impermanent – and complex – connection between land, sea, and society.

Q & A

DENISE SANATA

Academic advisor in the Gupta College of Science.

Q. What path led you to your current position as an academic advisor?

A. When I was an undergraduate student at Penn State, I had an awesome relationship with my academic advisor. She pushed me to be a better student and was the reason I got involved in the psychology department. I was the peer leader in her First-Year Experience course, and she helped me get connected with a summer internship. Early in college, I had no idea what I wanted to do with my degree. But during my junior year, I studied potential careers. I discovered I could pursue a graduate degree in higher education that would allow me to work in a variety of jobs, including academic advising. I thought it would be so rewarding to pursue a career where I could help students like my advisor did for me at Penn State. I applied to several graduate programs and eventually completed my master's degree in student affairs in higher education at Slippery Rock University. I had a phone interview with CCU the Monday after I graduated, and I've been here ever since!

Q. What does your job entail?

A. My job is cyclical based on the academic calendar; my duties vary depending on the time of year. In summer, I am busy with orientation for new students. I give lots of presentations to students, help introduce them to CCU, and get them setup with fall schedules. The fall semester is probably the craziest time. In the Professional Advising Center in the Gupta College of Science, I work with a team of advisors, and we mainly help first- and second-year students. We welcome new students in the fall and help them adjust to campus life. We meet with each of our students individually at least once per semester, and we typically have caseloads ranging from 250-300 students. Individual meetings with students are a huge part of the job. At these meetings, we typically talk about how classes are going, major choice, and registration for classes for the upcoming semester. Conversations vary, and we are here to talk through other issues or questions students may have. Throughout the spring, we continue working with our students. Most students are transferred to departmental faculty advisors after their first year. It's rewarding to be one of the key contacts for first-year students to help get them become comfortable with their new home at CCU.

All of our professional advisors also teach UNIV 110S: The First-Year Experience, which all students take in their first semester. We discuss common issues and provide students with a lot of information to help them succeed at CCU. We cover topics such as resources on campus, time management and goal setting, academic advising, managing finances, career exploration, stress management, and more. It's a fun class to teach, and I love getting to know my group of students each fall. I have a framed picture of my very first class from Fall 2014 in my office, and it makes me so happy!

Q. What advising challenges are posed by the novel coronavirus?

A. The fact that students can't easily meet with us face-to-face or drop by when they need something has been a challenge. During busy times like the first week of classes, most advisors have open walk-in hours to accommodate students and make it easy to address concerns. Since that is not an option in order to manage social distancing, things are slightly more difficult. Advisors are doing their absolute best to keep up with emails and phone calls, and our inboxes are constantly flooded since this is our main mode of communication. Being constantly "plugged in" to so many platforms (email, phone, Teams, Zoom) can be overwhelming for advisors, and I'm sure for students alike.

> WE MEET WITH EACH OF OUR STUDENTS INDIVIDUALLY AT LEAST ONCE PER SEMESTER, AND WE TYPICALLY HAVE CASELOADS RANGING FROM 250-300 STUDENTS.
>
> *– Denise Sanata*

Q. How has advising in the Gupta College of Science addressed these challenges?

A. Advisors are available via email, phone, Teams, or Zoom during normal work hours. Throughout the day, advisors are managing these multiple platforms to help students. This fall, we conducted all of our pre-registration advising meetings through Teams, which gave us the ability to see each other "in-person" and also to share our screen with students to show them important information that was helpful for advising and registration (program evaluation, WebAdvisor, University catalog, etc.). The University has also implemented an Advising Common Hour on Mondays and Tuesdays from 1-2 p.m., where students can drop in to meet with us via Teams.

Additionally, the University has streamlined approval processes and advisors/students can complete paperwork electronically. This avoids students having to visit multiple offices for signatures. With the help of many others across campus, we are making virtual advising work. I think that our students and advisors have adjusted well so far.

Q. Do you have any advice for a student seeking help from an advisor?

A. Email your advisor, and try to be patient. As I mentioned before, we are doing the best we can to address your concerns in a timely manner. Your advisor should get back to you within 48 business hours, and if you do not hear anything by then, you can try emailing again or calling. When you send an email, please give the necessary details for us to help you. We often get really short, unclear emails from students, and this takes more back-and-forth for us to figure out how best to help.

Let your advisor know if you find it easier to talk on the phone or video chat. Sometimes a question can be answered or a problem can be solved much more easily via a phone or Teams call. Remember, we are always here as a resource for you. In these trying times, we all need to give each other some grace. Winter break will be here before you know it!

Denise Sanata can be contacted at 843-349-6989 or dsanata@coastal.edu.

GUPTA COLLEGE OF SCIENCE ADVISING CENTER

SCIENCE ANNEX II 210
107 CHANTICLEER DRIVE

OFFICE HOURS
M-F: 8 A.M. TO 5 P.M.

RECENTLY FUNDED

research & publications

CCU FACULTY RESEARCH PROJECTS

William Ambrose, Ph.D.
School of the Coastal Environment

Received $21,768 from the National Science Foundation for Research Networking Activities in Support of Sustained Coordinated Observation of Arctic Change.

Derek Crane, Ph.D.
Department of Biology

Received $10,099 from the North Carolina Wildlife Resources Commission for a project titled Estimating Population Size and Age Distribution of Muskellunge in the French Broad River.

Paul Gayes, Ph.D.
Burroughs and Chapin Center for Marine and Wetland Studies

Received $247,888 from Synoptic for the National Mesonet Program. He also received $66,614 in funding from Horry County and the city of North Myrtle Beach for the Grand Strand Beach Nourishment Project 2020: Lessons to be Learned Guided from Past Experiences with Storms and Nourishments in the Grand Strand.

Till Hanebuth, Ph.D.
Department of Marine Science

Received $9,970 from Georgetown County for the Sampit River Vessel Accessibility project. He also received $126,299 from Georgetown County for Phase II of a Feasibility Study-Developing a Strategy to Overcome Georgetown Harbor Silting.

Angelos Hannides, Ph.D.
Department of Marine Science

Rich Viso, Ph.D.
Department of Marine Science

Received $117,961 from Horry County for the Water Level and Water Quality Monitoring in Singleton Swash project.

Chris Hill, Ph.D.
Department of Biology

Received $22,951 from the South Carolina Department of Natural Resources for a project titled Population Dynamics of Loggerhead Shrikes in a Commercial and Urban Landscape in Coastal South Carolina.

Will Jones, Ph.D.
Department of Computing Sciences

Received $89,525 from the Los Alamos National Laboratory for the HPC Scheduler Resilience Research project.

Varavut Limpasuvan, Ph.D.
Department of Marine Science

Awarded $209,891 from the National Science Foundation for a second year of an Intergovernmental Personnel Act (IPA) Assignment at NSF.

Doug Van Hoewyk, Ph.D.
Department of Biology

Received $154,089 from the National Science Foundation for a project titled The Physiology and Nitrogen Assimilatory Pathway of Spanish Moss (*Tillandsia usneoides*) in Response to Increased Nitrogen.

Robert Young, Ph.D.
College of Graduate Studies and Research

Received $72,967 from the National Oceanic and Atmospheric Administration for Stranding Response and Diagnostic Testing for the South Carolina Mammal Stranding Network: Final Transition Year.

CCU STUDENT RESEARCH PROJECTS

Garrett Elmo
Coastal Marine and Wetland Studies M.S. Program

Received $1,126 from the Slocum-Lunz Foundation for a project on validation of age estimate and back-calculation methods for juvenile Tarpon *(Megalops atlanticus)* in South Carolina estuaries.

CCU FACULTY AND STUDENT PUBLICATIONS

Abel, D.C. and R.D. Grubbs. 2020. Shark Biology and Conservation: Essentials for Educators, Students, and Enthusiasts. Johns Hopkins University Press. 448 pp. ISBN-10: 1421438364 (Department of Marine Science)

Collatos, C.*, **D.C. Abel** and K.L. Martin*. 2020. Seasonal occurrence, relative abundance, and migratory movements of juvenile sandbar sharks, *Carcharhinus plumbeus*, in Winyah Bay, South Carolina. Environmental Biology of Fishes: 103:859–873. doi.org/10.1007/s10641-020-00989-2 (Department of Marine Science)

Crane, D.P., C.J. Bauerlien*, M.R. Cornett*, M.L. Hawkins*, J.L. Hansbarger, D.A. Isermann, J.M. Kampa, K.L. Kapuscinski, J.R. Meerbeek, M.P. Rennicke, and T.D. Simonson. 2020. Validity of age estimates from muskellunge *Esox masquinongy* fin rays and associated effects on estimates of growth. Canadian Journal of Fisheries and Aquatic Sciences. 77: 69–80. doi.org/10.1139/cjfas-2018-0404 (Department of Biology)

Guo, S. 2020. Synchronous versus asynchronous online teaching of physics during the COVID-19 pandemic. Physics Education 55:6. Aug. 2020, doi:10.1088/1361-6552/aba1c5 (Department of Physics and Engineering Science)

McCauley, J. 2020. Light Environmentalists and quiet activism: identity alignment among participants in volunteer water quality monitoring programs. Sociological Spectrum. 6:375-391. (Department of Sociology)

Novak M.V.*, **D.P. Crane**, **L. Bell**, **L. Keiner**, C.R. Gatto, C.T. McNabb and **S.L. Parker** 2020. Spatial ecology of the Southern Copperhead in fragmented and unfragmented habitats. Journal of Herpetology, 54: 97 – 106. doi:10.1670/18-146 (Departments of Biology, Mathematics and Statistics, and Physics and Engineering Science)

Oldknow, C.J., F. Oldfield, A.S. Carr, J.M. Hooke, A. Biggin, J.F. Boyle, A. Hunt and **Z. Shen**. 2020, Palustrine wetland formation during the MIS 3 interstadial: Implications for preserved alluvial records in the South African Karoo: Sedimentary Geology, v. 405, p. 105698, doi.org/10.1016/ j.sedgeo.2020.105698. (Department of Marine Science)

Oldknow, C.J., A.S. Carr, J.M. Hooke and **Z. Shen**. 2020, The suitability of a low temperature post-IR IRSL signal for dating alluvial and colluvial "cut and fill" sequences in the Great Karoo, South Africa: Quaternary Geochronology, v. 58, p. 101064, doi.org/10.1016/ j.quageo.2020.101064. (Department of Marine Science)

Reynolds, T., C. Howard, H. Sjåstad, L. Zhu, T.G. Okimoto, R.F. Baumeister, K. Aquino and **J.H. Kim** 2020. Man up and take it: Gender bias in moral typecasting. Organizational Behavior and Human Decision Processes 161:120-141. doi.org/10.1016/ j.obhdp.2020.05.002 (Department of Psychology)

–CCU authors in **bold**.
–CCU student *.

COASTAL CAROLINA UNIVERSITY®

PRESIDENT'S HONOR LIST

BIOCHEMISTRY

Elody Bensch
Cameron Carroll
Ryan Covington
Lissett Diaz
(dual degree in marine science)
Nicole Frantz
Trinity Hanna
Klea Hoxha
Charlize Johnson
Carson Mickey
Lindsay Newton
Michael Orlando
Madaline Plank
Anna Tingler
Kimberly Weaver

BIOLOGY

Madison Ahrens
Carlee Andrews
Catherine Austin
Meagan Auth
Kaitlin Beasley-Polko
(dual degree in marine science)
Kylie Bostick
(dual degree in marine science)
Theresa Brick
Endry Brito
Killian Bucci
Barijana Caldas
Andres Castillo
(dual degree in chemistry)
Wesley Caudle
Chase Chessario
Katelyn Cilino
Chase Cortese
Katelyn Covert
Megan Cyterski
Natalie Cyterski
Mariah Earley
Samantha Elsey
Zarah Fowler
Sydney Fox
Hannah Franz
(dual degree in marine science)
Mackenzie Gibbs
Jacqueline Gould
Shontraia Guinn
Kendall Hale
Jordan Harrell
Samantha Helmenstine
Rebecca Hight
Caroline Hopkins
Makayla Johnson
Mackenzie Kim
Hannah Krin
Ashley Lehman
Kyla Manning
Kyle Miles
Jared Miller
Jordan Pearson
Lorela Pengu
Kaylee Petraccione
(dual degree in public health)
Emily Petraglia
Paige Petrizzo
Alexis Porohnavi
Kyra Ricci
Savannah Simpson
Trevor Stevens
Olivia Sundman
Elizabeth Taylor
Gregory Thompson
Jennifer Wiley
(dual degree in marine science)

CHEMISTRY

Andres Castillo
(dual degree in biology)
Caitlyn Evans

COMPUTER SCIENCE

Gavin Bailey
Jarod Bowers
Jason Carranza
Kyler Febbroriello
Auston Hefling
Feng Jiang
Ashley Madison
Nicklaus Przybylski
Shangxuan Xie
Zhiyong Yang
Ya Zheng

ENGINEERING SCIENCE

Gage Campbell
Julianna Davis
Nathan Dempski
Elton Tabaku
Brittany Whitehead
Langjian Zhu

EXERCISE AND SPORT SCIENCE

Morgan Aldrich
Sara Alston
Austin Arakelian
Hannah Arnold
Kendi Bailey
Dakota Barnes
Ebony Beasley
James Brown
Jeffrey Burley
Emily Calderon
Christopher Cannon
Jordan Cantey
Joy Carlson
Sydney Castagna
Alexis Coleman
Jacob Condon
Natalie Constantine
Christain Cooper
Piper Cote
Samuel Couture
Chandler Crews
Anthony Critelli
Bryn Daly
Lisa D'Ambrosio
Hannah Dresner
Ty'Anna Eaddy
Sydney Ellis
Jaibrion Favorite
Megan Finn
Natalie Flowers
Justin Fowlkes
Joseph Galante
Jeff Gary
Hannah Hayes
Mallory Henninger
Kiera Heslam
Terrance Heyward
Kylee Hill
Kurstin Hopkins
Brandon Jackson
Kyra Jackson
Brooke Jones
Jair Kelly
Kody Kimball
Jessica Lange
Gabrielle Leach
Paige Lentz
Hannah Mabry
Kaden Marinovich
Anya McSorley
(dual degree in psychology)
Dominique Mills
Austin Moran
Camryn Morgan
Isaac Murdock
Demetria Murray
Skyler Naves
Alyssia Nix
Abagail Nixon
Luke Norris
Courtney Olson

Gupta College of Science

Matthew Panzica
Samantha Parnell
Kayla Patrick
Tayler Poist
Paige Rivas
Gianna Rossman
Sean Safko
Joseph Sanchez
Matthew Schneider
Stephen Shrewsbury
Blease Simons
Kasper Skraep
Elizabeth Spivey
Micheal Starks
Kristina Strauss
Brian Sutton
Nicole Tassielli
Emma Thompson
Jenna Thompson
Chelsea Tobin
Nicole Van Dzura
Reina Vierra
Christian Walker
Hannah Walker
Nicole Wallin
Ronald Williams
Whitney Witherspoon
Ting Yen Yeh
Alicja Zduniak

HEALTH ADMINISTRATION

Ryan Grant
Jessica Matthews
Amy Miller

INFORMATION SYSTEMS

Mason Beattie
(dual degree in languages and intercultural studies)
Caleb Fins
Quinten Keener
Michael Link
Taylor Malamut
Anthony Zincone

INFORMATION TECHNOLOGY

James Augustino
William Brown
Johnathan Cassidy
Lauren Denning
Vanquacious Dennis
Thomas Fry
Michael Herbst
Dustin Kuczynski
Sean Morahan
Dawson Pickford
Colton Simms
Kiera Tyree
Jacob Williams

MARINE SCIENCE

Lauren Andrychowski
Alyssa Antolak
Jacey Ballard
Kaitlin Beasley-Polko
(dual degree in biology)
Abigail Beaty
Alden Bittrick
Kylie Bostick
(dual degree in biology)
Edie Brockman
Kristyn Bryant
Sydney Butler
Jesse Capps
Cori Carlston
Lissett Diaz
(dual degree in biochemistry)
Cailey Dorman
Bridget Dowell
Brooke Dunnery
Andrew Einhorn
Hannah Franz
(dual degree in biology)
Gabriella Fritz
Hannah Garthwaite
Brieanna Gillen
Bryn Gliebe
Jenna Godown
Nicholas Govostes
Jonathan Groff
Jordan Harrison
Erin Hefling
Katherine Herrell
Phoenix Holmes
Lynsey Isner
Paul Jennes
Julie Kavjian
Madeleine Kee
Emma Keiner
Allison Kladler
James Klein
Katherine Kline
Valerie Knowles
Allison Kreyer
Danielle La Venuta
Meredith LaLumia
Christina Lefebvre
Casey Ludwick
Zoe Lyons
Ayana Maryott
Tiffani McNeil
(dual degree in languages and intercultural studies)
Ezekiel Meyers
Rachel Myers
Amanda Neudenberger
Hailey Oldfield
Mary Olsen
Megan O'Neil
Briar Ownby-Connolly
Madison Pacino
Margaret Pepin
Kennedy Quillen
Timothy Rafala
Zachary Ramsey
Wesley Ritenour
Cecilia Rivera
(dual degree in interdisciplinary studies)
Eryn Roach
Russell Scherr
Mackenzie Scheuermann
Margaret Shoop
(dual degree in languages and intercultural studies)
Abigail Solarz
Sarah Sowell
James Spirek
Elizabeth Tautges
Daphne Terris
Abbey Thomas
Sarah Thomas
Noah Turner
Rachel Uebelacker
Jacob Vannoy
Christopher Walker
Ryan Ware
Kayla Washington
Haley Wells
Keela Wells
Brittany Whitcher
Joie Wicher
Jennifer Wiley
(dual degree in biology)

MATHEMATICS

Adam Goga
(dual degree in physics)
Sarah Gower
Jason Herman
Alexis Oliver
Sarlota Svobodova
(dual degree in finance)
Renea Urbaniak

PRESIDENT'S HONOR LIST

NURSING

Alexander Bryant
Elizabeth Caine
Tiffany Lawson
Benjamin Phillips

PHYSICS

Adam Goga
(dual degree in mathematics)
Grant Mitchell

PSYCHOLOGY

Kareem Barbis
Rose Behrmann
Erin Berzonski
Kaila Billingsley
Nikki Boon
Samantha Bossany
Dawn Brewer
Raquel Brien
(dual degree in history)
Nora Cheraghi
Hannah Cherewko
Kieran Colahan
Greyson Costner
Halle Cox
Sierra Dube
Amy Eacho
Savannah Elliott
Makhiya Eure
Reagan Grossoehme
Maggie Hennessy
Bethany Hewitt
Lauren Hribar
Madison Johnson
Natalie Kellam
Juliet Kraus
Alexandra Laird
Madison Magnus
Hailey Marrero
Kelli McElveen
Lyndsey McLamb
Anya McSorley
(dual degree in exercise and sport science)
Nicole Michael
McKayla Mills
Jenna Mize
Courtney Moss
Jessie Mount
Caroline Murray
Madison Myers
Kayla Neidermyer
Emma Oswald
Kayley Ozimac
Sarah Parker
Adonya Pertell
(dual degree in sociology)
Ashlyn Poling
Makenzie Prichard
Brett Richardson
Shannon Ryan
Martin Rydningen
Gabrielle Sellers
Kaylee Smith
Margaret Smith
Megan Smith
Alexis Starr
Monae Sumter
Kayleigh Travins
Lauren Tyndall
Jada Wilson
Jarrod Worley

PUBLIC HEALTH

Alexis Biernacki
Raven Brooks
Abigail Buchanan
Taylor Burns
Michelle Cabrera-Santana
(dual degree in languages and intercultural studies)
Rylee Chandler
Jordan Cockrell
Heather De la Cruz
Caroline Durham
Britney Estridge
Emily Gerding
Kirsten Good
Julia Hagerud
Abigail Hopper
Brenia Irvin
Jenjira Jinangkul
Danielle Johnson
(dual degree in communication)
Haley Johnson
Wesley Johnson
Kaylee Jordan
Mikayla Kegel
Allison Kint
Alyssa Klaess
Sarah Lauer
Zoe Lewis
Michaela McAuley
Catherine McFadden
Michael Meagher
Synclaire Mitchell
Elizabeth Mottola
Lina Perugini
Kaylee Petraccione
(dual degree in biology)
Hailey Restuccia
Erica Richardson
Kaitlyn Romanowski
Veronica Spates
Jenna Stash
Mikaela Straw
Meghan Thomas
Megan Wenzel
Grace Williams
Kilee Yager

RECREATION AND SPORT MANAGEMENT

Michael Agens
Tiffany Arafi
Megan Bozzi
Cedric Brown
Shon Brown
Sarah Cashion
Mackenzie Cherry
Keera Clarke
Payton Clemons
Jalen Darby
Brandon Darrigo
Madeline Davis
Jordan Donald
Courtney Dornheim
Thoburn Fauver
Andrew Ferreira
Robert Floyd
(dual degree in history)
Trace Fulmore
Tanner Gauthier
Sydney Guess
Sara Hake
Connor Havrisko
Jason Heon
Dylan Hoffman
Morgan Hyde
Bryan Johnson
Spencer Johnson
Evan Kerecz
Haley Kerwin
Katherine Kilroy
Saniyah King
Samuel Kyzer
Tyler Lahr
James Largen
Brenna Lindner
Maxwell Lowson
Kelsey Luther
Jared Marquard
Kyle McNeice
Carlton Miller
Mikole Moore
Alexander Mottola

Kyle Nachtsheim
Quinn Newbill
Lou Norton
Bernard Palmer
Laqavious Paul
Stephen Pratt
Carly Reardon
Brenden Reeverts
Dylan Reyes
Sean Rhodes
Amanda Richardson
Aaron Riggins
Samuel Rowell
Ty Scates
Nicole Schubert
Brandon Smith
Daniel Stevens
Kenneth Stocklinski
Morgan Sutton
Zachary Tatarka
Triston Thomas
Allyssa Timan
Maxwell Traill
Daryl Turner
Harris Varnum
Morgan Venters
Joshua Wegrzyn
Caroline Weiss
James Will
Brook Willenborg
Bradley Young

SOCIOLOGY

Mikayla Adams
Emily Aspinall
Rebekah Booth
Annie Burgess
Kristyn Cromer
Caitlin Evans-Brand
Danielle Gaddy
Kelsey Gibson
Tara Kellogg
Tori McLaughlin
Ashlyn Mumford
Hannah Osborne
Isabella Patterson
Adonya Pertell
(dual degree in psychology)
Celeste Provo
Kourtney Scott
Gregory Stephens
Casey Sullivan

STATISTICS

Andrew Elgin

DEAN'S HONOR LIST

BIOCHEMISTRY

Emily Andrews
Haley Barnabei
Quinn Blankenship
Grace Boykin
Laura Busby
Ashlynn Dorroh
Hayden Greene
Megan Harvey
Elizabeth Hassell
James Heldmann
Candace Howard
Mahealani Kanekoa
Alexis Malota
Sara Nibar
Jonah Nordeen
(dual degree in psychology)
Conner Rapp
Mya Roblee
Olivia Shirley
Owen Smith
Shayna Smith
Korinne Swanson
Lucy Valentik
Emeline Ward
(dual degree in marine science)

BIOLOGY

Sarah Abel
(dual degree in marine science)
Brittany Adams
Darina Aynaeva
Gianna Barone
Madison Borrero
Kieanna Buckley
Orriona Burgess
Deriyah Butler
Skylar Campbell
Catherine Chamberlin
Emily Cipriano
Allison Clark
(dual degree in marine science)
Ciara Cleary
Kira Clyatt
Tyra Countiss
Kendall Coyle
Jessica Coyne
Tyler Cutaia
(dual degree in psychology)
Kelsey Danford
Mitchell Dantuono
Payton Deming
Alyssia Dilorenzo
Lily Dittmar
Emily D'Orsaneo
Avery Drouin
Erica Evans
Meagan Fleming
Craig Fleury
Lindsey Flinchum
Elena Foust
Hailey Frick
Aubrey Gaglia
Taylor Gerard
Kaylie Grainger
Rachel Greene
(dual degree in marine science)
Fallyn Harrelson
(dual degree in languages and intercultural studies)
Peyton Hartenstein
(dual degree in marine science)
Evan Hendrickson
Tehsia House
Harley Huey
William Jennings
Heather Juhlin
Ebenezre Kassaye
Amber Ketcham
MacKenzie King
Virginia Knight-Lieberman
Robert Kotara
Krystal Lamb
Lucian Lang
Eboni Leach
Emma Lehmann
Bailey Lewis
Ilyssa Liberto
Zontavion Logan
Antwine Loper
An Ly
Sydney Madden
(dual degree in marine science)
Megan Majewski
Caleb McClellan
Elizabeth McCrea
Sarah McDowell
Makayla McElhaney
William McNeill
Maya Meenan
Kimberly Mena
Andrea Mendoza
Abbey Montoya
Marteena Morgan-McNeil
Nora Mouer
(dual degree in marine science)
Jordan Mozingo
Avy Muon
Michelle Ness
Ajay Patel
Jaiden Phelps
McKenna Poenitske
Joseph Pokwatka
Samantha Porter
Chesney Price
Anastaia Prosser
Aaron Reolegio
Torey Richute
Cole Riggins
(dual degree in marine science)
Zaeontae Robinson
Alix Savoie
(dual degree in marine science)
Ariana Sheha
Lynnae Shultz
Briana Simmons
Alyssa Simpson
Katherine Singleton
Kaleigh Sisolak
Kassidy Smith
Alexis Stovall
(dual degree in marine science)
Ryan Thomas
Tien Tran
(dual degree in marine science)
Justin Tremblay
Farruhjon Turgunov
(dual degree in mathematics)
Jeremy Vugteveen
(dual degree in marine science)
Katherine Watts
(dual degree in marine science)
Caitlyn Weinstein
Hannah Wenrich
Ashleigh Wheeler
Marena Willeford
Tahliya Wilson
Jenna Winterberg

CHEMISTRY

Maura Bramlitt
Mekalah Brocklehurst
Caitlyn Hunt
Dustin Lowe

COMPUTER SCIENCE

Zachary Baker
Carson Carruthers
Gianna Conway
Ryan De la Cruz
Jordan Drakos
Joseph Garrett
Ahmad Geter
Jaylen Haggwood
Jarod Hayes
Jorden Hodges
Migeljan Imeri
Cole Jiron
Bailey Johnson
Michael Jones
Brandon Keisler
Timothy Kelly
Nathan Marshall
Kelby Martin
Devin McClure
Kristin Painter
Parit Patel
Samuel Pichardo
Joseph Prendergast
James Rashid
Daler Raxmatjonov
Clay Squires
Bradley Stemmle
Benjamin Sun
D'Asia Surrett
Brian Taylor
Baihe Tian
Westley Wooddell
Dkari Worthy

ENGINEERING SCIENCE

James Andrew
Morgan Baltzegar
Savannah Burdette
Dustin Chambers
Alec Devlin
Heidrun Hlynsdottir
Bethany Locklear
William Melton
Kyle Montgomery
Spencer Nickle
Matthew O'Rourke
Isabella Pinkas
Jaquon Williams

EXERCISE AND SPORT SCIENCE

Alexandra Abarca
Miranda Altman
Claire Alverson
Nathen Andrews
John Astudillo
Samantha Aufderheide
Veronica August
Caitlyn Baber
Tyler Ballenger
Jordan Bennema
Caysen Bennett
Mya Bess
Raven Birch
Amanda Bixler
Karla Blake
Cody Bokash
James Bookard
Brice Brand
Faith Breland
Sophie Brettler
Cayla Brewer
Tanae Brown
Carlie Burner
Kameron Burton
Madeline Campbell
Kinsey Cannon
Cassandra Carley
Morgan Carr
Cade Carter
Patrick Carter
McKinley Chapman
Alec Cherebin
Linda Clark
Bernise Cohen
Trevor Coleman
Christina Coley
Joshua Compton
Luke Connor
Hubarri Cunningham
Trevor Curtis
Abigail Davis
Silver Dawson
Iyanla De Jesus
Evan DenDanto
Raegan Dixon
Jordan Dunfee
Marti Easler
Zaria Edmonds
Denise Erskine
Megan Fatzick
Alaina Ferrante
Triston Finley
Taylor Fiorentino
Gianna Florez
Valerie Florio
Madison Forren
Gabrielle Freeman
Lara Gabriele
Ethan Gainey
Macey Gathers
Madison Gettings
John Gray
Whitney Hager
Kieran Hagerty
Alisa Haik
Haleigh Hale
Chad Haller
Courtney Harbaugh
Payton Horton
Keiona Houser
(dual degree in art studio)
Jonah Humphries
Austin Jackson
Caroline Johnston
Haley Jones
Jacob Jones
Carina Julian
Aaron Keeler
Silas Kelly
(dual degree in management)
Alyssa Kerns
Megan Kirby
Luke Krupa
Curtashia Ladson
Alyssa Laubenthal
Janelle Lauttenbach
Michaela Lawlor
Michael Lehman
Gavin Lewis
Angelica Linsmeier
Tiffany Linton
Kaylee Lorenzetti
Alea Luther
Margaret Lynch
Benjamin Madsen
Jocelin Mahon
Mackenzie Manning
Jake Marine
Morgan Marlow
Uriel Mauricio
Shannon Maynard
Hannah McCallister
Joella Miller
Spencer Miller
Jessica Monteleone
Kelsia Moore
Caitlin Moriarty
Aidan Myers
Tatyana Nesmith
James Nettles
Mary O'Connor
Elizabeth Otto
Noah Page
Carter Parlow
Tariney Pepper
Jayden Perry
Nicolas Planchard
Stephanie Poynton
Brianna Prince
Kevin Rafferty
Lauren Richter
Thomas Ritter
Caroline Robbins
Alyssa Russo
William Schuessler
Evan Sheffer
Lauren Shellenberger
Angela Shepko
Laryssa Silva
Willard Simons
Michael Smith
John Sossamon
Tyler Steinfeld
William Stewart
Marc Stratiff
Jennifer Sundahl
(dual degree in marine science)
Nathan Tekle
Hailey Thomas
Jonathan Thomas
Kendale Utter
Kailee Vander Lyke
Gabriella Velleggia
Damareeay White
Hunter White
Kathryn Wilbanks
Nazair Wilson
Myka Wydo
Morganne Young

HEALTH ADMINISTRATION

Kacy Blevins
Samantha Earnhardt
Lindsay Edwards
Tianeshia Heath
Michael Henry
Callie Hughes
Madyson Skelly
Timothy Smith
Alicia Thompson
Sara Kate Tolliver
Keynovia Williams

INFORMATION SYSTEMS

Clark Dotson
Ian Graham
Alexander Heiberg
Alayna Johnston
Kelsey Lafaso
Skyler Reep
Elyssa Sexton
Tyler Shobe
Jamarcus Smith
Zachary Smith
(dual degree in communication)
Ryan Wethey

INFORMATION TECHNOLOGY

Nicholas Bonn
Tamya Bradley
Keenen Corry
Jeanne Dehetre
Nysheim Dewitt
Bryan Dilone
Rhiannon Dore
Jason Dupree
Tabias Evans
Lee Gandy
Jennifer Gregg
Trevar Hall
Abigail Hobbs
James Kesler
Randall King
Brandon Lackey
Elliott Lambert
Brandon Langreck

DEAN'S HONOR LIST

Breonia Lee
Riley Lutrario
(dual degree in sociology)
Nhoj McLean
Anthony Meeks
Dallis Meminger
Tyler Montgomery
Christina Nance
Riley O'Brien
Ginger Pettit
Zion Phillips
Aaron Rice
Shamarius Rucker
Yusef Sadek
Marque Scott
Marcus Starr
Brandon Valerio
Ethan Varn
Tyler Vitale
David Welsh

MARINE SCIENCE

Sarah Abel
(dual degree in biology)
Lillian Adams
Molly Aeschliman
Olivia Akerley
Samantha Alderman
Cacy Allen
Daniel Allen
Cotie Alsbrooks
Haleigh Andrew
Joshua Ashworth
Maya Aylor
Erica Baba
Hannah Bagley
Daniel Baker
Shannon Baldino
Regan Baltasar
Angela Barreto
John Beavers
(dual degree in psychology)
Jacob Berrocal
Maisie Biles
Rose Bimbi
Chloe Binas
Ariana Birchler
Jonathan Blackwell
Noelle Briggs
Mitchell Brooks
Rachel Broumas
Eric Brown
Matthew Brown
Jordan Browning
Madison Bruno
Courtney Bryant
Devin Bucci
Grace Buschiazzo
Vanessa Calling
Bridget Campbell
Alexis Carmona
Lauren Carroll
Kaylea Carter
Vincent Ceci
Justin Cerv
Jacquilynn Chao
Jessica Christian
Allison Clark
(dual degree in biology)
Jacqueline Cole
Sarah Collins
Shannon Combs
Corinna Conaway
Julia Copeland
Allison Correa
Hallie Corzine
Lindsay Cowen
Karina Cox
Kaylie Crawford
Julia Crews
Sydney Davis
Paulina DeAnda
Jacob Dicken
Tabatha Doetsch
Jayvin Douglas
Mary Doyle
Molly Duda
Zach Dunham
Ashton Dunnigan
Carissa Emory
Jason Engler
Matthew Evans
Gregory Fackler
Andrew Feliton
Alexis Franklin
Julia Frey
Stefanie Fridkin
Madeline Fudala
Adriene Funck
Alexandra Gall
Sunnidae Gallien
Oriana Gary
Alexander Gauger
Abigail George
Hazel Gillette
Callista Gleich
Victoria Gluck
Anne Gossman
Robert Grecu
Rachel Greene
(dual degree in biology)
Gabrielle Grobbel
Alexis Gue
Nicholas Gulnick
Payton Guyer
Hannah Haefner
Jordan Hall
Peyton Hartenstein
(dual degree in biology)
Brittany Hartley
Anna Hartman
Callie Hawkins
Abigail Hayes
Rachel Hildebrand
Fiona Hughes
Kaylecia Humphreys
Emily Hura
Julia Illar
Brittany Jacobs
(dual degree in psychology)
Faith Jacobus
Brooklyn Johnson
Kayla Johnson
Kyle Jolls
Claire Kalinsky
Jacob Kassel
Ian Kavanaugh
Chloe Keller
(dual degree in engineering science)
Amber Kuck
Annika LaRoche
Alyssa LeClaire
Olivia Lentchner
Faith Liddicoat
John Loiacono
Yasmine Lopez-Vargas
Skyler Lorick
Brady Ann Lynch
Sydney Madden
(dual degree in biology)
Sierra Mahoney
Alexandra Makogon
Dwight Marazas
Logan Masterson
Victoria Matter
Casey Mazzone
Sidney McCoy
Hannah McCutcheon
Kaitlin McGivney
Diana Menendez Cebreros
Bethany Merchant
Haileigh Miller
Laura Miller
Michael Miller
Alexa Million
Charles Mina
Morgan Monk
Hunter Moore
Jonathan Moore
Chloe Morrow
Nora Mouer
(dual degree in biology)
Meghan Music
Bethany Newton
Britney Nicholson
Karyssa Niedt
Hogan O'Brien
Kirstin O'Donnell
Mimi Oliver
Madison O'Neill
Shawn Passeri
Timothy Patrick
Megan Pauley
Riley Peninger
London Perry-Tatem
Riley Phelps
Constantine Powers
Gwyneth Pumphrey
Nicole Rainwater
(dual degree in mathematics)
Tajay Ramos
Rachel Redding
Kaelen Reed
Logan Rice
Grace Richa
Cole Riggins
(dual degree in biology)
Tamara Rivera
Madison Robison
Ashley Rom
Cheyanne Rufener
Riley Russell

Rachel Salinas
Jade Salis
Jessica Sanders
Ethan Sandy
Alix Savoie
(dual degree in biology)
Lea Schroeder
Ashley Schwenck
Caroline Senter
Tina Sepahpur
Maddie Sheng
Jessica Shoemaker
Amber Shore
Lucas Short
Madison Sieminski
Hannah Slacum
Wyatt Slatter
Benjamin Smith
Zachary Smith
Mary Snow
Leilani Solaita
Abigail Spangler
Megan Speer
Kailey Stillman
Alyssa Stogner
Alexis Stovall
(dual degree in biology)
Jennifer Sundahl
(dual degree in exercise and sport science)
Hunter Sutherland
Miles Tarullo
Natasha Terry
Walker Todd
Tien Tran
(dual degree in biology)
Nicholas Turner
Rebecca Tyner
Nicholas Urbanek
Hayden Ushkow Crumb
Carleigh Veeley
Jeremy Vugteveen
(dual degree in biology)
Emeline Ward
(dual degree in biochemistry)
Katherine Watts
(dual degree in biology)
Karsen Wendelin
Thomas Wesselhoff
Cassady Whaley
Courtney Williams
Makenna Williams
Taylor Wood
Hailey Woodward
Candra Workman
Dean Wrobel
Rachel Yuscavage
Lia Zazzera
Katelyn Zimmerman
Julie Zylich

MATHEMATICS

Kurtis Arnold
Meghan Birchfield
Trini Cole
Lindsey Gerald
Chandler Irvin
Michael McFarlane
Alessandro Molinas
Drew Mort
Heston Neal
(dual degree in engineering science)
Ariana Smith
Matthew Smith

NURSING

Christine Drew

PHYSICS

Duvall Dickerson-Evans
Willie Ferguson
Brandon Holladay
Colton Lloyd
Michael Melchiorre
Cole Munger
Andre Newbauer
Camryn Perry
Cameron Watkins
Benjamin Wellons

PSYCHOLOGY

Matthew Abajian
Arianua Adams
Tara Allen
Pornsawan Angelo
Rylee Atteberry
(dual degree in art history)
Omeisha Bacote
Neelie Bailey
Brachus Baldridge
John Beavers
(dual degree in marine science)
Liliana Benson
Jazmine Bolden
LaDaysha Bonaparte
Perris Bowling
Adam Bretton
Destiny Burgess
Carol Burke
Kimberly Cameron
Alyssa Carey
Anna Carpenter
Elisabeth Chambers
Rebecca Clark-Blouin
Elizabeth Coker
Andria Colvin
Anne Conti
Alexis Couto
Montana Crosby
Emily Cruse
Kiley Cuba
Tyler Cutaia
(dual degree in biology)
Gianna D'Aconti
Alexis Daly
Garrett Darling
Kylee DeFrese
Lindsey Denney
Caitlynn Dennie
Carlie Dingle
Ah'keiyana Dinkins
Jessica Dyarmett
Ashante Edwards
Skylar Ellison
Jordan Farrell
Caleb Farrington
Madison Fecteau
Jacquelyn Fennell
Riley Fetzer
Faith Finan
Shakera Fuller
Kelly Gasque
Haileyana Ghadiri
Donna Gilbert
Caitlyn Glancy
Alexandra Glinka
Caroline Gray
Myance Green
Madison Gregory
Troy Hancock
Emily Hatcher
Meghan Hepner
Cassandra Herberger
Rheanna Herrera
Chance Hewett-Williams
Sonya Holmes
Deegan Hudson
Angela Hurd
Alexandra Ilkhani
Gabrielle Ivanov
Brittany Jacobs
(dual degree in marine science)
Laurin Janning
Amaya Johnson
Sarah Johnson
Alexis Jordan
Adam Karaskevicus
Colin Katchmar
Kelsey Kenavan
Jacob Kirby
Kira Koon
Kennedy Kopazna
Allie Rose Kotkowski
Julia Krantz
Brynn Leiphart
Caitlyn Lewis
Jessica Lomas
McKenzie Lucas
Hannah Lurcock
Casey MacDonald
Alyssa Martin
Makenzie Martin
Kaitlin Maurer
Jordan Maxwell
Alexandria Mays
Hanna McClure
Rebecca McDaniel
Nicole McDonald
Troy Mcie
Sidney McLaughlin
Tessa Meadows
Steven Menzer
Chase Merritt
Rhiannon Mertens
Lucia Moliterno
Jaylyn Moore
Corinne Myers
Alexis Natali
Pavllo Neco
Savannah Nixon
Jonah Nordeen
(dual degree in biochemistry)
Cameron O'Connell

DEAN'S HONOR LIST

Hollie Paquette
Fiona Paul
Freddie Pearson
Jerardo Perez
Marco Perrucci
Zachary Perry
Katlyn Picataggio
Brittney Plusnick
Sarah Poisson
Kayla Powers
Tiffany Proctor
Mckenzie Rhoades
Cameron Rice
Sarah Rine
Chelsea Roberts
Elizabeth Roberts
Maya Roller
Rita Rose
Cielo Ruiz
Kaysa Ruiz
Natalie Seibel
Kaitlin Serad
Hayley Sheriff
Jada Sims
Elizabeth Skipper
Garrett Small
Alexandra Smith
Haley Smith
Anna Snyder
(dual degree in management)
Grace Sutz
Grace Sweet
Fredrick Taylor
Kaelah Torres
Kaleigh Tunnell
Julia Unger
Peyton Usher
Jennifer Vasquez
Sandra Walder
Jessica Warzel
Kayla Wasserman
Karley Watts
Kyle Westfall
Cecilia White
Devon Williams
Jaquoia Williams
Wynter Williams
Stacey Wolf
Elisabeth Wood
(dual degree in public health)
Estephanie Xolo
Chelsea York

PUBLIC HEALTH

Sarah Allen
Raven Anderson
Brae-Elise Ayers
Samantha Azzinaro
Ashton Baker
Shelley Baker
Emily Bates
Michelle Boyette
Emily Brittingham
Brendan Burns
(dual degree in languages and intercultural studies)
JaNyya Burton
Cassidy Callaghan
Emily Caton
Hayley Chapman
Jasmine Chavis
Noelani Coleman
Lauren Corrigan
Kirsten Courtney
Tiahya Davis
Courtney Dean
Michael Donoghue
BreAnna Dorman
Taylor Ehret
Destiny Epps
Samantha Flinn
Hailey Flynn
Paige Garrison
Lauren Gibson
Alexis Gontz
Haley Green
Zy'Keira Green
Brittany Hansen
Lauren Havlir
Alana Hawkins
Skylar Hicks
Bria Hill
Janesia Hill
Ilivia Horsfall
Darnasia Jenkins
Zi'Kieeya Johnson
Jacklyn Jung
Kristian Keller
Hannah League
Alana Leath
Jordyn Lord
Amanda Martin
Linsey Martin
Emily McBride
Megan Moore
Moasia Moore
Erin O'Hagan
Amanda Ortiz
Austin Overstreet
Nicole Pascarella
Preslee Peeler
Audra Phillips
Myah Piccinetti-Reuther
Maria Platis
Naomi Reed
Jada Salley
Carson Sanders
Kyra Sciallo
Katelin Sellers
Brianna Shelley
Melina Shildt
Brooke Spence
Madelyn Spethmann
Armani Sumpter
Sophie Sumpter
Taylor Sweigart
Cassandra Thibodeau
Susan Walker
McKinley Ward
Lauren Watkins
Imani Williams
Hannah Witherspoon
Elisabeth Wood
(dual degree in psychology)

RECREATION AND SPORT MANAGEMENT

Makenna Albanese
Eva Alexander
Emmily Attocknie
Sean Aubry
Wesley Ayen
Stephen Bachleda
Alexander Baldini
Sierra Baxter
Jackson Bell
Nicholas Benson
Lee Blakeney
Tae Bogan
Flynn Bourgault
Olivia Buccheri
Jordan Carnes
Victoria Carnevale
Sammie Carter
Ally Clegg
Olivia Crum
Nikolaus Czarnota
Charles Daniels
Deonte Davis
Mason DeFilippis
Indeveer Dulku
Dallas Earnhardt
Cameron Edwards
Travis Elseroad
Shane Essick
Conrad Felks
Pierce Funderburk
Tyrel Gallman
Jakob Gragg
Shanyiah Gregg
Brett Grove
Qua'Neshia Hamilton
Rachel Hamilton
Amari Hansen
Kimoni Harris
Rodkeede Hawthorne
Jacob Heritage
Griffin Holcombe
Sarah Holl
Wesley Hooven
Matthew Hopeck
Gregory Horrocks
Jack Hudson
Bry Ireland
Morgan Jackson
Ahykeem Jennings
Darby Jones
Austin Keiper
Alexander Kennedy
Derek Kidd
Connor Kirkley
Joseph Leidell
Gregory Liverpool
Dante Mackey
Tyler Marchese
Conner McCarthy
Joshua McDuffie
Bryce McLaughlin
Joseph Morrell
Jonathan Murphy
Gavin Noble
Kamryn Nobles

Taylor Novotny
Lerol Parchment
Makenzie Pate
Natalie Peay
Brian Port
Alexa Reginatto
Sarah Rhodes
Ryan Salb
Sabrina Satchell
Justin Scola
Maxine Skeens
Samantha Steidl
Tanner Sulich
Kaylie Taylor
Seth Taylor
Cameron Thore
Adlai Traver
William Ullmann
Daniel Vance
Kayla Vest
Kolby Vest
Diontre' Walker
Jamison Walker
Thomas Walker
Charles Wilson
Cassie Wishner
Kyle Yaffee
Thomas Zinngrebe

SOCIOLOGY

Peyton Adams
Sydney Alvis
Jashalie Aponte Reyes
Jaqueline Badillo
Joshua Barnes-Edwards
Ashlyn Bevel
Julia Brockman
Chloe Cahalan
Connor Cartmell
Tabyus Conley
Cheyenne Cudd
(dual degree in intelligence and national security studies)
Callan Curry
Carolynn Dallas
Lacy Desimone
Casey Donohoe
Shatreia Dotson
Anne Ettare
Jasmine Ford
Shannon Foy
Ronyaih Frierson
Alexander Gattinelli
Lamonica Grissett
Kristen Guccione
Emily Hampton
Keoshia Huffman
Eve Ivey
Ezekiel Jano
Jonathan Kerr
Brandom King
Dajah King
Angelica Link
Jackson Little
Michael Loyd
Pamela Lund
Riley Lutrario
(dual degree in information systems)
De Anna Mason
Anthonette Maynard
Stephanie Maza
Shemaiah McKenzie
Sydney Moss
Jorredan Moultrie
Kaitlyn Munoz
Janessa Ocasio
Megan Ressa
Daniel Richards
Callie Rogers
Jacqueline Saraceno
Abby Sellers
Alyssa Seningen
Victoria Shepherd
Natasia Singleton
Ryan Smith
Rachael Spall
Kayla Thasitis
Jyria Tisdale
Samantha Torsiello
Grace Traver
Daniel Turner
Andrew Vereen
Carly Wassil
Sha'nayia White
Tyler Williams
Alexis Wrighton

UNDECLARED SCIENCE

Hanna Cordle
Alexandra Knapton
Julia Salois
Allie Sida
Emily Wagner

COASTAL CAROLINA UNIVERSITY

Gupta College of Science
P.O. Box 261954
Conway, SC 29528-6054

ENGINEERING SCIENCE

apply now

COASTAL CAROLINA UNIVERSITY

coastal.edu/engineeringscience