

# DIVISION OF NATURAL SCIENCES

## Overview

The natural sciences seek to shed light on the rules that govern the natural world by using empirical and scientific methods. At New College, the Division of Natural Sciences (<https://www.ncf.edu/departments/natural-sciences/>) includes the following Areas of Concentration (AOCs): Applied Mathematics, Biochemistry, Biology, Chemistry, Computer Science, Data Science, Marine Biology, Mathematics, Natural Sciences, Physics, and Statistics.

The Division of Natural Sciences is housed in the Heiser Natural Sciences Complex. Two wings (34,000 square feet) were completed in 2000 and a third wing (22,000 square feet) was added in 2017. The Heiser Natural Sciences Complex consists of the William G. Selby and Marie Selby Building for Biology and Chemistry, the Paul H. Hanson Building for Mathematics and Physics, the Soo Bong Chae Memorial Auditorium, and the new wing. The entire complex was designed to enhance the close collaboration between teacher-scholars and student-scholars crucial to the mission of New College. It contains 26 well-equipped research and teaching laboratories, including a 20-station computer laboratory and instrument rooms. Research and teaching laboratory spaces are in close proximity, and faculty offices in the laboratory sciences have windows with views into the laboratories, closely connecting faculty with student work at all times. A highlighted feature is the 24-station chemistry-teaching laboratory with twelve transparent fume hoods and the three new 24-station teaching laboratories. Situated at the vertex of the complex, the Soo Bong Chae Memorial Auditorium is a multimedia lecture and demonstration space with three tiers of seating for nearly 80 participants. In keeping with the New College policy of actively engaging students in research projects, research education is emphasized, and students learn to use instruments early in their program. Highly sophisticated equipment is available to research students in biology, chemistry, biochemistry, computer science, mathematics, and physics. Our newest facility is a Nanotechnology Lab to study the properties of tiny structures used in cutting-edge technologies for the computer, robotic, medical, and optical communication fields.

The Pritzker Marine Biology Research Center (<https://www.ncf.edu/academics/research-new/pritzker-marine-biology-research-center/>) houses over 100 aquaria and features student and faculty research laboratories, classrooms, and office space for New College's marine biology program. Each tank in the Living Ecosystem Teaching and Research Aquarium features a different captive ecosystem, several with a camera to send images to a streaming video server. Underneath the building, an additional 10,000 square feet of space provides room for quarantine, storage, and the system that supplies seawater to the facility's aquaria and labs.

## Programs in the Division of Natural Sciences

- Applied Mathematics (<https://catalog.ncf.edu/undergraduate/natural-sciences/applied-mathematics/>)
- Biochemistry (<https://catalog.ncf.edu/undergraduate/natural-sciences/biochemistry/>)
- Biology (<https://catalog.ncf.edu/undergraduate/natural-sciences/biology/>)

- Chemistry (<https://catalog.ncf.edu/undergraduate/natural-sciences/chemistry/>)
- Computer Science (<https://catalog.ncf.edu/undergraduate/natural-sciences/computer-science/>)
- Data Science (<https://catalog.ncf.edu/undergraduate/natural-sciences/data-science/>)
- Marine Biology (<https://catalog.ncf.edu/undergraduate/natural-sciences/marine-biology/>)
- Mathematics (<https://catalog.ncf.edu/undergraduate/natural-sciences/mathematics/>)
- Natural Sciences (<https://catalog.ncf.edu/undergraduate/natural-sciences/natural-sciences/>)
- Physics (<https://catalog.ncf.edu/undergraduate/natural-sciences/physics/>)
- Statistics (<https://catalog.ncf.edu/undergraduate/natural-sciences/statistics/>)