Support the molecular sciences
The school is defining a new approach to research and academics in the molecular sciences and is creating a use-inspired environment in which to train a new generation of undergraduate and graduate students for success in an increasingly post-disciplinary scientific world. An investment in the School of Molecular Sciences is an investment in our students, faculty and staff who are committed to building Arizona State University’s reputation in leading cutting-edge molecular science.

14 NSF and DOE CAREER Awards
10 Regents Professors
2 President’s Professors
2 Endowed Chairs

sms.asu.edu

Research and education programs that have impact
The School of Molecular Sciences is redefining chemistry and biochemistry in contemporary research fields that produce solutions with real societal impact. The school’s educational programs are designed to meet the needs of a wide diversity of students.

Contemporary research
Materials and nanoscience
Chemistry of biology
Medicine and health
Energy and sustainability
Environmental and biogeochemistry
Fundamental molecular science

Societal impact
Developed Zika virus test
Built cancer-fighting nanorobots
Designed artificial leaf
Nanostructures to harvest the sun’s energy
Molecular computing inside cells

Inclusion and diversity
726 incoming undergraduates
32% first-generation students
44% racial and ethnic diversity
37% Pell Grant eligible
53% women

Fact sheet
Natural sciences
Our mission is to extend the limits of fundamental molecular and materials science, take what we learn to address important societal problems and to pass that understanding and passion for discovery on to the next generation of scientists, with education programs measured on the basis of equity, inclusion and how our students succeed.

We educate students from all over the United States from a variety of socio-economic backgrounds. Our educational goal is to provide opportunity and meet the needs of as diverse a group of students as possible. We offer a use-inspired learning environment and training that will be relevant going into the next century.

**Leading global impact and innovative solutions**

The School of Molecular Sciences exemplifies ASU’s spirit of innovation. The school has been responsible for obtaining the first pictures of atomic orbitals, synthesizing the first metal-organic frameworks (MOFs), determining the first X-ray free electron laser crystal structure of a protein, and launching the first fully online bachelor’s degree in biochemistry.

**Pioneering researcher**

Michael O’Keeffe is a towering figure in the field of atomic and electronic structure of crystalline solids. His work at ASU resulted in the first pictures of atomic orbitals and the invention of a new field in materials science: metal-organic frameworks (MOFs). Between 2000 and 2010 he was the third most cited chemist in the world.

**Structural revolution**

Petra Fromme’s group is part of an international team that generated the first crystal structure of a protein using femtosecond X-ray nanocrystallography, a new tool so powerful that it promises to revolutionize the field of structural biology.

**Access and opportunity**

SMS launched the nation’s only fully online biochemistry degree. The program is designed to meet the needs of a more diverse group of students and provide opportunity and access to learning for students who might otherwise be excluded from college degree programs.

**Cultivating an inclusive environment**

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