Department of Physics

Contact Information

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Introduction

The Department of Physics offers programs that lead to Bachelor of Science, Master of Science, and Doctor of Philosophy degrees. The focus of this department's research includes: condensed-matter physics, surface science and nanotechnology, high-energy physics and string theory, biophysics and soft-matter physics, atomic, molecular, and optical physics, and science education. In addition to basic research, we also promote online education and digital science research to bolster science education and learning systems.

Instructional Objectives

In addition to the upgrades in the core physics courses and secondary school teacher training program, we are emphasizing career counseling and professional skills, adding more applied science courses such as the Electro-Optical program which fosters semiconductor, modern optics, and photonics science and technology professionals.

Degree Requirements

Undergraduate

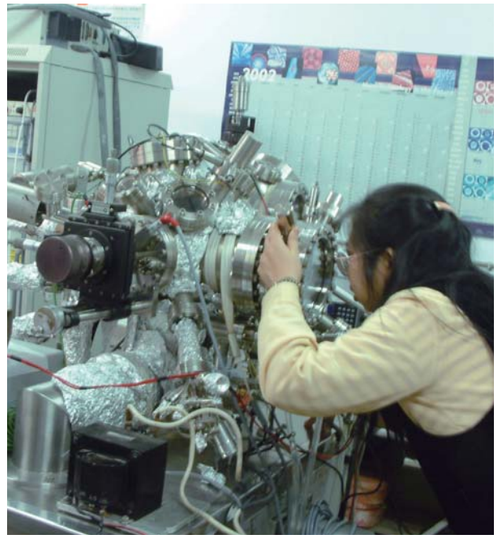
General compulsory credits	Compulsory Department Course Credits	Electives Credits		Minimum Requirements for Graduation
		Minimum Department Course Credit Requirement	Optional Credits	
28	60	15	25	128

Compulsory Department Courses

General Physics, General Physics Experiments, General Chemistry, General Chemistry Experiments, Calculus, Application of Computer in Physics, Mechanics, Thermal Physics, Electromagnetism, Experimental Physics, Mathematical Method in Physics and Modern Physics, Optics.

Graduate (Taught in English)

Master of Science	Doctor of Philosophy (Ph.D.)
Quantum Mechanics (I), (II) 6 credits Statistical Mechanics (I) 3 credits Classical Electrodynamics (I) 3 credits Seminar 3 credits	Quantum Mechanics (I), (II) 6 credits Statistical Mechanics (I) 3 credits Classical Electrodynamics (I), (II) 6 credits Classical Mechanics 3 credits Seminar 3 credits



Feature of the Curriculum

Undergraduate

- Research Internship
- Overseas Internship
- Industrial Internship

Graduate

Major research fields conducted by our faculty members include:

- Condensed-matter physics
- Surface Science, spintronics, and nanoscience
- High-energy physics
- String theory
- Astrophysics and cosmology
- Biophysics and soft-matter physics
- Atomic, molecular, and optics physics
- Science education
- Overseas Internship, Industrial Internship

Career Prospects

A physics degree is a ticket to a wide range of science, engineering, and technology careers. One of the most common careers for a physics major is a physics teacher. However, our courses combine research-based and hands-on practical education, so our students have access to a variety of career options, such as technical specialists, application engineers, research associates, data analysts, design engineers, IT consultants, lab technicians, laser engineers, optical engineers, software developers, systems analysts, accelerator operators, web developers and high school physics teachers.