

# Physics

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Physics is the study of matter and energy, and their interactions in the areas of mechanics, heat, sound, optics, electricity, magnetism, radiation, and the atomic and sub-atomic world. Physics provides students with concepts and models for describing, understanding, and predicting many characteristics and phenomena of physical and biological systems. As such, it provides the foundation for many other sciences such as chemistry, astronomy, biology, geology, engineering, and medicine.

A minor in Physics is an appropriate choice for students pursuing majors in Environmental Science and Human Biology. It is also a good choice for students who plan to teach at the secondary level because there is a chronic shortage of qualified physics teachers.

Students seeking information on teacher certification should contact the Education Office.

## Minor

Code	Title	Credits
<b>Supporting Courses</b>		<b>18</b>
MATH 202	Calculus and Analytic Geometry I	
MATH 203	Calculus and Analytic Geometry II	
PHYSICS 201	Principles of Physics I	
PHYSICS 202	Principles of Physics II	
<b>Upper-Level Courses</b>		<b>12</b>
PHYSICS 310	Modern Physics	
<b>Elective Courses (choose a minimum of 9 credits from the following):</b>		
CHEM 320	Thermodynamics and Kinetics	
CHEM 321	Structure of Matter	
CHEM 322	Thermodynamics and Kinetics Laboratory	
CHEM 323	Structure of Matter Laboratory	
ENGR 348	Electromagnetic Fields and Applications	
ENV SCI 415	Solar and Alternate Energy Systems	
ET 318	Fluid Power Systems	
ET 324	Motors and Drives	
MATH 410	Complex Analysis	
MATH 425	Dynamical Systems	
PHYSICS 404	Electricity and Magnetism	
PHYSICS 417	Nuclear Physics and Radiochemistry	
PHYSICS 420	Advanced Physics Laboratory	
<b>Total Credits</b>		<b>30</b>

### Faculty

**Heidi S FencI**; Professor; Ph.D., The Ohio State University

**Michael Hencheck**; Associate Professor; Ph.D., The Ohio State University, Chair

**Brian Welsch**; Assistant Professor; Ph.D., Montana State University