

Physics Secondary Education Graduation Requirements – 64 hrs
(Certification in Science with a designation in Physics)

Physics Courses (30)

- PHYS 231 Introductory Physics I (4) **Fall only**
- PHYS 232 Introductory Physics II (4) **Spring only**
- PHYS 294 Physics Seminar (2) **Spring only**
- PHYS 334 Computer Modeling of Physical Systems (2) **Fall only**
- PHYS 331 Spacetime and Quanta (4) **Spring only**
- PHYS 351 Analog Electronics (2) **Fall only**
- PHYS 341 Analytical Mechanics (4) **Spring Only**
- PHYS 345 Methods of Data Analysis and Presentation (2) **Fall only**
- Choose 1 from PHYS 342, 344, or 359 (4)
- PHYS 494 Seminar (2) **Spring only**

Math Courses (18)

- MATH 231 Calculus I (4)
- MATH 232 Calculus II (4)
- MATH 245 Linear Algebra (4)
- MATH 331 Vector Calculus (2)
- MATH 333 Differential Equations (4)

Supporting courses (16)

- CHEM 231 General Chemistry (4) **Fall only**
- ASTR 305 (4) or PHYS 305 (4) in the Black Hills
- BIOL 201 Principles of Biology (4) or BIOL 241 (4) **Fall Only**
- SCI 325 Middle School Science Methods (2) **Fall Only**
- SCI 321 High School Science Methods (2) **Spring Only**
**SCI 321 must be taken the school year before you plan to student teach (example. If you take SCI 321 in Spring 2015, you would student teach the following Fall 2015 or Spring 2016)

Lab Work

At least 2 semesters as a lab assistant in the Physics

MAT Program:

Those interested in pursuing an Accelerated Masters in Teaching as an undergraduate can complete **either** the Physics Education track of courses listed above **OR** the traditional Physics major track with the supporting science classes listed above. Either track of Physics coursework may be chosen to meet the MAT requirement but a hybrid of Physics courses between the two tracks cannot. All Education coursework remains the same regardless of what track is chosen.

Please see the Science Education Coordinator or Physics advisor with questions and for scheduling or email her at betsy.leong@wheaton.edu