

BACHELOR OF ARTS IN PHYSICS
RECOMMENDED COURSE SEQUENCE - EFFECTIVE Fall 2012

| Year | Fall Semester | Spring Semester | Credits |
|-------------|--|--|--|
| Freshman | PHYS 1100 Fun of Physics PHYS 2303 Contemporary Physics MATH 2413 Calculus I [#] CHEM 1311 General Chemistry 1 CHEM 1111 Chemistry Laboratory 1 RHET 1302 Rhetoric UNIV 1010 Freshman Seminar | PHYS 2325 or PHYS 2421 Mechanics* PHYS 2125 Mechanics Laboratory MATH 2414 Calculus II [#] CHEM 1312 General Chemistry 2 CHEM 1112 Chemistry Lab 2 HUMA 1301 Exploration of the Humanities | Fall - 15 Spring - 15 - 16 Total Hrs - 30 - 31 |
| Sophomore | PHYS 2326 or PHYS 2422 Electromagnetism and Waves* PHYS 2126 Electromagnetism Laboratory MATH 2415 Calculus of Several Variables MATH 2418 Linear Algebra HIST 1301 Themes in American History | PHYS 3411 Theoretical Physics MATH 2420 Ordinary Differential Equations. PHYS 3325 Electronics PHYS 3125 Electronics Laboratory GOVT 2301 Government 1 | Fall - 15 - 16 Spring - 15 Total Hrs -60 - 62 |
| Junior | PHYS 3416 Electricity and Magnetism PHYS 3330 Numerical Methods and Computational Techniques Physics Elective 3 credit hours Science Elective 3 credit hour Social Science Elective 3 credit hours | PHYS 4311 Thermodynamics/Statistical Mechanics PHYS 3312 Classical Mechanics PHYS 4373 Physical Measurements Laboratory** Science Electives - 3 credit hours GOVT 2302 Government 2 | Fall - 16 Spring - 15 Total Hrs - 91- 93 |
| Senior | Science Electives - 6 credit hours Electives - 3 credit hours AP 1301 Exploration of the Arts Advanced Elective (Non-physics) - 3 credit hours | PHYS 4390 or PHYS 4399 Advanced Writing (or Thesis) Science Elective - 3 credit hours HIST 1302 Issues in American History Elective -3 credit hours Advanced elective (Non-physics) - 3 credit hours | Fall - 15 Spring - 15 Total Hrs - 121 -123 |

Notes:

[#] MATH 2413 is a prerequisite for and MATH 2414 is a corequisite for PHYS 2325.

[#] MATH 2414 is a prerequisite for PHYS 2326.

* PHYS 2421 Honors Physics I may be electively substituted for PHYS 2325.

* PHYS 2422 Honors Physics II may be electively substituted for PHYS 2326.

51 Hours of upper division courses (course numbers beginning with 3 or greater) are required for all degrees.

** Research Experiences for Undergraduates (REUs) during the summer are highly recommended for Physics majors planning to continue their education in graduate school, whether in physics or another discipline. Formal REU programs exist at many universities, national laboratories, and even overseas, and usually offer a stipend typical of a graduate teaching assistantship. Announcements for REU programs usually appear online in December and application deadlines usually range from late January to early March. Requirements vary, but students are often eligible if they have completed their freshman year.