

LIBERAL ARTS AND SCIENCES

Associate in Science Degree | Transfer Degree | Department of Engineering, Physics and Technology

Physics Option

A student interested in the Associate in Science (AS) degree in Liberal Arts and Sciences has to choose one of four options: Biology, Chemistry, Earth Systems and Environmental Science, or Physics. Each option prepares students for transfer to a complementary four-year degree program. Students in the Physics option usually transfer to colleges offering bachelor's degrees in engineering (civil, electrical, mechanical, etc.) or in the physical sciences. Enrichment programs are offered to encourage students to continue their education beyond the bachelor degree by attending graduate or other professional programs (e.g., medical school, physician assistant programs, physical therapy programs). Please note that the option articulates with SUNY Empire State College. Please visit the Transfer Planning web site for more details.

Curriculum Coordinator: Dr. Akhil Lal

LIBERAL ARTS AND SCIENCES CURRICULUM (PATHWAYS)

60 Credits required for AS Degree

Required Core

- A. English Composition (6 Credits)
- B. Mathematical and Quantitative Reasoning
 - MTH 30¹ Pre-Calculus Mathematics *OR* MTH 31 Analytic Geometry and Calculus I (4 Credits)
- C. Life and Physical Science
 - CHM 11¹ General Chemistry I (4 Credits)

SUBTOTAL 14

Flexible Core

- A. World Cultures and Global Issues (3 Credits)
- B. U.S. Experience in its Diversity (3 Credits)
- C. Creative Expression (3 Credits)
- D. Individual and Society (3 Credits)
- E. Scientific World
 - CHM 12¹ General Chemistry II (4 Credits)

Restricted Elective* Select one course from Area A-E. (3 Credits)

SUBTOTAL 19

Major Requirements

- Free Electives (0 - 5 Credits)
- MTH 31** Analytic Geometry and Calculus I (0 - 4 Credits)
- MTH 32 Analytical Geometry and Calculus II (5 Credits)

Physics Option Requirements

- MTH 33 Analytic Geometry and Calculus III (5 Credits)
- PHY 31 General Physics I (4 Credits)
- PHY 32 General Physics II (4 Credits)
- PHY 33 General Physics III (4 Credits)

SUBTOTAL 27

¹ This program has obtained a waiver to require STEM variant courses in Required Core Area B and Area C and Flexible Core Area E. If students transferring into this program complete different courses in these areas, they will be certified as having completed the Common Core requirements, but it may not be possible for them to finish their degree within the regular number (60) of credits.

* Restricted Elective: must select one course from Flexible Core A-E. No more than two courses in any discipline or interdisciplinary field.

** For students that take MTH 30 to fulfill the Required Core.