Physics, BS

LAPHYBS

Expand your understanding of the universe on a deep, fundamental level by participating in innovative research areas and cross-disciplinary collaborations that are at the forefront of today's most compelling questions. If you're interested in immediate practical applications, this bachelor's degree program lays the foundation for success.

Program description

Physics is concerned with the nature, structure and interactions of matter and radiation. In the BS program in physics, students develop general problem-solving skills that enable them to interpret and solve new problems covering virtually any phenomenon in the physical universe, including classical or quantum systems, electric or magnetic behavior, and thermal or statistical physics.

The BS program in physics provides a solid foundation in physical science and mathematics, and prepares students for further graduate study in physics, other sciences or engineering programs.

In addition to reviewing the guidelines in the Concurrent Program Options section below, students interested in pursuing concurrent or second baccalaureate degrees in The College of Liberal Arts and Sciences are advised to visit The College's website for more information and requirements.

At a glance

- **College/School:** The College of Liberal Arts and Sciences
- **Location:** Tempe or Online, ASU Local

- **Second language requirement:** No
- **First required math course:** MAT 270 - Calculus w/Analytic Geometry I
  OR MAT 265 Calculus for Engineers I
- **Math intensity:** Substantial 

Required courses (Major Map)

2024 - 2025 Major Map (on-campus)
2024 - 2025 Major Map (online)
Major Map (Archives)

Concurrent program options

Students pursuing concurrent degrees (also known as a "double major") earn two distinct degrees and receive two diplomas. Working with their academic advisors, students can create their own concurrent degree combination. Some combinations are not possible due to high levels of overlap in curriculum.

Accelerated program options

This program allows students to obtain both a bachelor's and master's degree in as little as five years. It is offered as an accelerated bachelor's plus master's degree with:

Materials Science and Engineering, MS

Acceptance to the graduate program requires a separate application. Students typically receive approval to pursue the accelerated master's during the junior year of their bachelor's degree program. Interested students can learn about eligibility requirements and how to apply.

Admission requirements

General university admission requirements:
All students are required to meet general university admission requirements.
First-year | Transfer | International | Readmission

Tuition information

When it comes to paying for higher education, everyone's situation is different. Students can learn about ASU tuition and financial aid options to find out which will work best for them.

Change of Major Requirements

Current ASU students who wish to change their major to physics should have a minimum cumulative GPA of 2.50 for all critical classes they have completed.

Students should visit the Change of Major form for information about how to change a major to this program.

Attend online

ASU Online

ASU offers this program in an online format with multiple enrollment sessions throughout the year. Applicants may view the program's ASU Online page for program descriptions and to request more information.

ASU Local

It is now possible to earn an ASU degree with ASU Local, an integrated college experience in which students take advantage of in-person success coaching and programming experiences on site while completing one of 130+ undergraduate online degree programs, all of which come with online faculty interaction and tutoring support.

Transfer options

ASU is committed to helping students thrive by offering tools that allow personalization of the transfer path to ASU. Students may use MyPath2ASU® to outline a list of recommended courses to take prior to transfer.

ASU has transfer partnerships in Arizona and across the country to create a simplified transfer experience for students. These pathway programs include exclusive benefits, tools and resources, and they help students save time and money in their college journey.

Global opportunities

Global experience

Students gain valuable experience through study abroad, experience that enhances their resumes. With more than 300 programs available in a variety of countries around the world, study abroad allows students majoring in physics to tailor their experience to their unique interests and skill sets.

Graduates who possess the heightened cultural competency, leadership and critical thinking skills they acquired when studying abroad may stand out in a competitive field.

Career opportunities

The wide variety in applicability of the principles of physics allows for great flexibility in a choice of career or further education.

Graduates with a Bachelor of Science in physics possess analytical and technical skills suitable for employment in areas such as data analytics, education, engineering, finance, information technology, materials science, science communication and more.

Graduates are also prepared for admission to graduate school or advanced study in astronomy, engineering, mathematics, medicine and physics.

Example job titles and salaries listed below are not necessarily entry level, and students should take into consideration how years of experience and geographical location may affect pay scales. Some jobs also may require advanced degrees, certifications or state-specific licensure.

Career	*Growth	*Median salary
Astronomer	4.6%	$128,330
Engineering Manager	4.1%	$159,920
Nuclear Engineer	1.1%	$122,480
Physicist	4.7%	$142,850
Physics Professor	3.8%	$86,550
Radiologist	3.6%	$0
Scientist/Biochemist	6.7%	$103,810
Technical Writer	6.9%	$79,960

* Data obtained from the Occupational Information Network (O*NET) under sponsorship of the U.S. Department of Labor/Employment and Training Administration (USDOL/ETA).

Bright Outlook

Contact information

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