



Photo credit: Astronomy Department

CONNECT WITH US

Events

Attend department events with students, staff, and faculty. Join our **Advising Discord**, follow us on **Instagram**, **Facebook**, and **Twitter**, and visit our **Astro events and news**.

ADVISING

Brianna Franklin is the Academic Advisor. Contact her for more information on major and minor requirements, policies, procedures, department resources, events and activities. Advising appointments can be made using Calcentral. For general information, please contact astroadvising@berkeley.edu.

Join our **Advising Discord** and view our **Astro wiki page** for information about courses, resources and more.

Eugene Chiang is the Undergraduate Faculty Advisor. Email him for office hours and assistance with content of courses, research, graduate school and career development.

Climate Advisors and Undergraduate Student Representative

Do you have any feedback or concerns on climate, curriculum, etc.? Check in with the **Undergraduate Climate Advisors** or the **Undergraduate Student Representative**, and join our bi-annual Town Hall meeting with the Chair and Faculty Advisor.

HOW TO USE THIS MAP

Use this map to help plan and guide your experience at UC Berkeley, including academic, co-curricular, and discovery opportunities. Everyone's Berkeley experience is different and activities in this map are suggestions. Always consult with your advisors whenever possible for new opportunities and updates.

Visit ue.berkeley.edu/majormaps for the latest version of this major map.

Berkeley

Astronomy

501 Campbell Hall #3411

Berkeley, CA 94720-3411

astro.berkeley.edu

ASTROPHYSICS

Bachelor of Arts

Berkeley
UNIVERSITY OF CALIFORNIA

INTRODUCTION TO THE MAJOR

The UC Berkeley Astrophysics Undergraduate program prepares students to understand the world beyond our own! The Department of Astronomy endeavors to meet that need by providing students access to a broad spectrum of courses taught by prize-winning faculty, state-of-the-art facilities, first-class scientists and researchers, and opportunities to conduct research projects. The Astrophysics major provides students physical reasoning, computational and analytical skills and prepares them for a career in academia, data science, tech and space industry, and many other fields.



Photo credit: UC Regents / Lick Observatory

“ I like the closeness of the Astronomy department, how there are frequent chances to interact with other undergraduates, graduates, postdocs, and faculty alike. ”

– Nicholas Rui, Class of '20

THE ASTROPHYSICS CURRICULUM

Berkeley Astronomy courses cover an array of topics. The lower division ASTRO 7A & 7B courses give a comprehensive overview of our Universe, from exoplanets to cosmology. The upper division courses offer an in-depth view on planetary astrophysics (162), stellar physics (160), and relativistic astrophysics and cosmology (161). Our program stands out by its unique and rigorous lab courses, including the optical-IR (120), the radio astronomy (121), and the data science (128) labs. Courses are taught by expert faculty, ensuring a more enlightened and thorough educational experience.

AMPLIFY YOUR MAJOR

- Join the Undergraduate Astronomical Society.
- Learn how to program in Python early by taking our DeCal course, PHYSICS 77/88, or CS 61A.
- Conduct a research project with one of our world-renowned scientists in the Astronomy Department, SSL, or LBL.
- Apply to a summer REU program
- Apply to an undergraduate student instructor (UGSI) or grader position.
- Join CalTeach to prepare for a career in education. Talk to CalTeach faculty director Eugene Chiang.

	FIRST YEAR	SECOND YEAR	THIRD YEAR	FOURTH YEAR	
Explore your major	<p>Meet with your Astro advisor and L&S advisor to discuss your academic plans.</p> <p>Review major and college requirements.</p> <p>Complete MATH 1A + 1B and PHYSICS 5A/7A.</p> <p>Learn more about the major with the Astrophysics FAQ, Piazza page, and Berkeley Astronomy Wiki.</p>	<p>Complete MATH 53, PHYSICS 89/MATH 54, PHYSICS 5B/7B + 5C/7C and ASTRO 7A + 7B.</p> <p>Take Astro Python coding DeCal course, PHYSICS 77/88, or CS 61A.</p> <p>Submit the required forms to declare the major to your major advisor.</p> <p>Get access to Campbell Hall for use of lab space, KAIT room, and study lounge.</p>	<p>Focus on upper division requirements and electives.</p> <p>Review your degree progress with your major and college advisor. See the Astro Degree Check Template and Advising Table.</p> <p>Enroll in ASTRO 198: Introduction into Research (you must already be involved in research).</p>	<p>Do a degree check to ensure you are on track to graduate.</p> <p>Complete any “bucket list” courses and remaining major, college, and campus requirements.</p> <p>Register for the department and campus-wide commencement ceremonies.</p>	<p>WHAT CAN I DO WITH MY MAJOR?</p> <p>The undergraduate program prepares students for astrophysics graduate work or other advanced degrees in related science and engineering fields. It also prepares students for careers in teaching or for working in data science and other technical fields. Our students graduate with research and lab experience, computational and analytical skills, and an education that will equip them in their chosen fields and professional endeavours.</p> <p>Jobs and Employers</p> <p>Chemist, Argonne National Lab Data Scientist, Lockheed Martin Mission Integration Engineer, SpaceX Process Engineer, DiCon Fiberoptics Quantitative Analyst, BofA Research Asst., Cambridge University Research Intern, NASA-Ames Ctr. Scientist, Stanford University Scientist, James Webb Space Telescope Software Engineer, Amazon Software Engineer, Samsung Tutor, C2 Education</p> <p>Graduate Programs</p> <p>Applied Mathematics, PhD Astronomy, PhD Astrophysics, PhD Chemical Engineering, PhD Computer Science, PhD Data Science, PhD Earth and Planetary Science, PhD Geophysics and Seismology, PhD Neuroscience, PhD Physics, PhD</p> <p>Examples gathered from the First Destination Survey of recent Berkeley graduates.</p>
Connect and build community	<p>Sign up for the Astronomy mailing list and follow us on Facebook, Twitter, and Instagram.</p> <p>Join the Undergraduate Astronomy Society.</p> <p>Participate in the Astro Buddy Program, Berkeley Connect, or L&S Mentors Program.</p> <p>Take advantage of (STEM) community and resources from programs like Cal NERDS and EOP.</p>	<p>Participate in stargazing and science talks at Astro Night and Science@Cal.</p> <p>Get to know your Astronomy professors and graduate student instructors by attending office hours.</p> <p>Explore other student groups like Society of Women in the Physical Sciences, Out in STEM, or AstroQ.</p>	<p>Attend weekly Department Lunch Talks, Astronomy Colloquium, Theoretical Astrophysics Center Seminars, and the CIPS seminar.</p> <p>Become a buddy in the Astro Buddy Program.</p> <p>Get involved in student organizations like LEAD.</p>	<p>Gain leadership experience by applying for an officer position with the Undergraduate Astronomy Society.</p> <p>Join a professional association such as the American Astronomical Society.</p> <p>Connect with alumni groups such as the UC Berkeley Astronomy group on LinkedIn and build your network as you prepare to graduate.</p>	
Discover your passions	<p>Apply for the Physics & Astronomy Scholars Program or Berkeley SEED Scholars Program.</p> <p>Attend the Undergraduate Research and Scholarships Fair in October.</p> <p>Get involved in campus research with ULAB.</p> <p>Enroll in Howard Isaacson’s “Introduction to Research” course in the summer after your first year.</p>	<p>Find a research project by attending the Astronomy Undergraduate Research Symposia or through URAP.</p> <p>Attend our “Success after Berkeley” seminar series on academic resources, graduate school, career development, research and more.</p> <p>Enjoy teaching? Explore a career in education while gaining teaching skills with CalTeach.</p>	<p>Apply for summer research programs (American Astronomical Society (AAS) List of Summer Research Opportunities, Haas Scholars Program, SURF, Cal-NERDS)</p> <p>Interested in astro instrumentation? Attend Professor Jessica Lu’s AstroTech summer school.</p> <p>Apply to be an Astro UGSI or grader.</p>	<p>Consider applying to the Astronomy Honors Program or writing a senior thesis.</p> <p>Teach your own DeCal course.</p> <p>Present your research at a scientific meeting.</p>	
Engage locally and globally	<p>Attend the Calapalooza student activities fair and get involved with a student organization.</p> <p>Find service opportunities through the Public Service Center.</p> <p>Explore study, internship, and research abroad options with Berkeley Study Abroad or Berkeley Global Internship.</p>	<p>Enroll in a Sophomore Seminar, Big Ideas Course or Discovery Course.</p> <p>Engage in STEM education and mentorship of local youth with Support, ENcourage, and Develop for Children at Berkeley.</p> <p>Experience life at another UC or college on a visitor and exchange program.</p>	<p>Become a Golden Bear Orientation Leader and welcome new students to UC Berkeley.</p> <p>Go on a service-learning trip with the Alternative Breaks Program.</p> <p>Enrich your studies with a certificate, course thread, or summer minor.</p>	<p>Hone your leadership skills with the Peter E. Haas Public Service Leaders program.</p> <p>Explore service opportunities after graduation, such as Peace Corps, Teach for America, or U.S. Department of State.</p>	
Reflect and plan your future	<p>Attend the Astrophysics “Success after Berkeley” seminar series on academic resources, graduate school, career development and more.</p> <p>Visit the Berkeley Career Engagement and Career Counseling Library. Sign up for Handshake and CareerMail.</p> <p>Explore career fields through the Career Connections Networking Series or a winter</p>	<p>Meet with a Career Educator, Astro Advisor or Undergraduate Faculty Advisor to discuss your career options and goals.</p> <p>Learn about graduate and professional school. See Step-by-Step for planning help.</p> <p>Consider an internship and attend internship fairs.</p> <p>Try some self-assessment activities to explore different directions within Astrophysics.</p>	<p>Discuss post-graduate options with advisors and professors.</p> <p>Interested in going to graduate school? Meet with our Undergraduate Faculty Advisor.</p> <p>Attend Astronomy workshops on graduate school and career exploration, as well as Career and Graduate School Fairs.</p> <p>Update your resume and LinkedIn profile.</p>	<p>Apply to jobs, graduate school, and other opportunities.</p> <p>Planning to go to graduate school? Apply to the NSF-GRFP and other fellowships.</p> <p>Utilize job board tools in your job search.</p> <p>Meet employers at Employer Info Sessions and On-Campus Recruiting.</p>	