

ASTRONOMY 4

Solar System Astronomy

De Anza College | Course Syllabus | Fall 2026

Course Details

Term	Fall 2026, De Anza College
CRN	00207
Course	ASTR D004.01Y – Solar System Astronomy
Format	Hybrid: weekly in-person lecture + asynchronous online work
Canvas	F26 ASTR D004 01Y Solar System Astronomy
Instructor	Srikar Srinath
Email	srinathsrikar@fhda.edu

Textbook

Astronomy, 2nd Edition by OpenStax, written in part by Foothill's own Prof. Fraknoi, is available free online in multiple formats:

- Read online (Web View)
- Download as PDF — recommended, since you can annotate it in any PDF reader
- Download as ePUB for e-readers

Use whichever format works for you. The PDF is the most flexible for note-taking.

Lectures

A weekly lecture will be held in the De Anza Planetarium on Mondays from 1:30 PM–3:45 PM. Additional supplementary videos will be posted each week for asynchronous watching.

Office Hours & Questions

Office hours will be held right after lecture from 3:45 to 4:00 pm and during lecture breaks. I'm also happy to meet with you over Zoom. Here's how:

- Zoom by appointment: Send me a Canvas message with 2–3 times that work for you. I'll send you a Zoom link for a mutually convenient time.
- Canvas Inbox: Best for most questions. I typically respond within 12–24 hours on weekdays. If you message on a Friday evening, expect a reply by Sunday evening. If you haven't heard from me within that window, send a follow-up — your message may have slipped down in my inbox.

About This Course

Astronomy 4 is an introductory course about the contents of our Solar System and what we have learned through nearly 70 years of space exploration and 400+ years of telescopic observation. No prerequisites. The class is designed for non-science majors, but we will be doing real science because anybody can.

De Anza College advises: ESL 5 or equivalent English proficiency.

Attendance & Engagement

Regular attendance is required. If you do not attend a lecture in the first two weeks of class, you will be dropped.

Plan to spend around 5 hours per week on coursework (watching lectures, completing assignments, etc.). The course builds on earlier concepts week by week, so keeping up is important.

Grades

Your grade is based on assignments, an in-class midterm, and attendance.

Weekly assignments (40%)

Each week, a lab involving online tools or simulations, plus a recent article or video related to course topics, will be posted. Please actually do the labs — they don't take long, I try my best to make them interesting, and feeding them into AI models and submitting the output is academic dishonesty (often funny for me to read) and will result in a reduced grade for you.

In-class midterm (40%)

In week 5 (depending on the progress we make in lecture, this could shift to week 6) there will be an in-class midterm, multiple choice. I will post a practice midterm the week before the exam. Only documented medical reasons will be accepted as an excuse for not taking the exam.

Attendance (20%)

Attendance will be taken at every lecture (there are only 11). Please remember there is a difference between attending and being present. Please minimize your device use, especially during planetarium sessions, since that will diminish not only your night vision but also that of your neighbors. If you have work or family reasons for being late or missing class, please let me know in advance and you will be excused.

Extra credit

Starting around Week 9, you may select a Solar System-themed video from the Silicon Valley Astronomy Lecture series and write a short report.

Late Policy

Assignments are due on the date posted. Late submissions are penalized 20% per day, up to a maximum of 5 days. After 5 days, the assignment will not be accepted and will be marked as a 0.

If something comes up, the extra credit assignment exists for exactly this reason.

Academic Integrity & AI Use

The Short Version

Don't cheat. Don't submit work that isn't yours.

Cheating on any assignment is grounds for a failing grade and a permanent note in your student file, with additional consequences at the discretion of the administration.

Generative AI: What's Allowed and What Isn't

AI tools like ChatGPT, Claude, and Gemini are genuinely useful for learning. They can re-explain confusing concepts, help you organize your thoughts, and clean up your writing. You're encouraged to use them. But there's a right way and a wrong way.

The key rule: Do the work first, then use AI to help you write it up — and always disclose.

DO:

- Complete all required activities on your own first: labs, simulations, readings
- Use AI afterward to help organize your findings or improve your writing
- Use AI freely for studying: getting a second explanation, brainstorming, or simplifying material
- Disclose your AI use at the end of your submission (see below for an example)

DON'T:

- Feed the assignment prompt to an AI model and submit what it gives you
- Use AI to generate descriptions of labs or simulations you didn't actually do
- Invent or fabricate data, measurements, or tool outputs
- Add a one-liner like “I used AI to help” with no specifics — that's not disclosure, that's a fig leaf, and it still counts as cheating

What Counts as Cheating

Submitting AI-generated work without proper disclosure is cheating even if you add a disclaimer afterward. If your submission describes observations, data, or experiences from a lab or simulation you didn't actually do, that's academic dishonesty — regardless of whether AI or you wrote it.

How to Disclose AI Use

At the end of your assignment, add a brief note. It takes 30 seconds, is usually worth 10% of the assignment grade, and there is no penalty if done properly. The less detail you provide about your AI use, the more points you lose.

1. Best option: share a link to your chat session. Almost all AI tools let you generate a shareable link. If yours does, paste it in. That covers everything.

“I used Claude (claude.ai) to reorganize my paragraphs after completing the simulation. Chat link: [link]”

2. If your tool doesn't support chat links: provide the tool name and version, the prompt(s) you used, and a brief note on what you changed or kept.

“I used ChatGPT (GPT-5.2) after finishing the crater simulation. My prompt was: ‘Here are my notes. Help me write two paragraphs from them.’ I kept the structure but rewrote most of the sentences.”

Not acceptable: “I used AI to help with this assignment.” That tells me nothing and does not count as disclosure.

The labs in this course are designed so that doing the activity is the learning. An AI doing it for you means you miss the point — the solar system is too interesting to outsource.

Course Schedule

Lecture content is tentative based on class progress. Assignments will only cover material presented up to the due date. Dates are subject to change — always check Canvas for the most current schedule.

Week	Date	Ch.	Topic
Week 1	Sep 21	Ch 1	Cosmic Context
		Ch 2	Diurnal, Annual, and Planetary apparent motions
Week 2	Sep 28	Ch 3	Orbits: Kepler & Newton, The Seasons
		Ch 4	Moon phases, Tides, Eclipses
Week 3	Oct 05	Ch 5	Time & Light
		Ch 5	Spectra
Week 4	Oct 12	Ch 6	Telescopes on Earth and in Space: how they work

Week	Date	Ch.	Topic
		Ch 7	Overview of the Solar System
			Practice midterm available
Week 5	Oct 19		MIDTERM
Week 6	Oct 26	Ch 8	Earth-shaping processes and Climate Change
Week 7	Nov 02	Ch 9	Cratered Worlds: The Moon and Mercury
		Ch 10.1–10.3	Venus
Week 8	Nov 09	Ch 10.4–10.6	Mars
		Ch 11	The Giant Planets
Week 9	Nov 16	Ch 12	Moons of the Giant Planets
		Ch 13, 14	Dwarf planets, asteroids, comets
Week 10	Nov 23	Ch 15	The Sun
		Ch 16	The Sun: stellar and Solar System formation
Week 11	Nov 30	Ch 21, 30	Planets around other stars, Life in the Galaxy
Week 12	Dec 7		Extra credit assignments due (no lecture)

Student Learning Outcome(s):

- Appraise the benefits to society of planetary research and exploration.
- Compare and contrast the development of planetary systems and of the major planet types, including those factors that have led to Earth's unique characteristics.
- Evaluate astronomical news items or theories concerning solar system astronomy based upon the scientific method.

Office Hours:

1:00 PM - 1:30 PM

6:45 PM - 7:15 PM

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