

ASTR 007/PHY 007 – Introduction to Astronomy  
Spring 2013  
MWF 1:10–2:00 pm, LL 316

**Instructors:**

Prof. Ginny McSwain  
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office hours: MW 2:00–3:00 pm or by appointment

**Course Objectives:**

Students will gain an understanding of how astronomical observations of the Solar System, stars, the Milky Way Galaxy, and other galaxies contribute to our knowledge of the Universe.

**Required Materials:**

Comins & Kaufmann, *Discovering the Universe*, 9<sup>th</sup> edition  
AstroPortal (online companion to *Discovering the Universe*)  
Electronic clicker (Turning Point brand)  
Scientific calculator

If you purchase the textbook from an online retailer, you WILL NOT receive discounted access to the AstroPortal. I strongly recommend that you purchase the bundled package through the Lehigh Bookstore or directly from the publisher’s website (there are discounted options available; see Prof. McSwain for details).

All students are encouraged to go “paperless” as much as is reasonable. Handouts will be distributed electronically using Lehigh’s Course Site (please print them only if necessary), and other announcements will be distributed via your Lehigh email address. You are expected to check your email and Course Site frequently for updates.

**Grading:**

Participation – 10%  
Learning Curve online exercises – 10%  
Homework – 15%  
Hour Exam 1 – 20%  
Hour Exam 2 – 20%  
Final Exam – 25%

Attendance is strongly encouraged but not required.

Participation points will be awarded based on electronic clicker participation in class. Please bring your clicker to every class - you will not earn participation points without it. Sending your clicker to class with a friend is considered cheating, and cases will be reported to the Office of Student Conduct.

Reading assignments will be posted on the Course Site page in advance of each lecture. You should come to class prepared to discuss the readings. For each chapter that we cover, you will be expected to complete the associated Learning Curve exercise in the online AstroPortal by the end of the unit.

Late homework will be penalized by 5% per day late, and makeup exams are not allowed, without a valid excuse. It is the student's responsibility to have any excuse validated by the Dean of Students office to avoid penalties. If you have a valid excuse, the professor will set a reasonable deadline to complete the work. Every assignment must be turned in to receive a passing grade for the course.

Exam grades will not be curved. After the final exam is complete and all student work is accounted for, a curve may be applied to the final averages if necessary.

### **Academic Integrity:**

Copying work from other students or outside sources is considered plagiarism, and it will not be tolerated. Outside references (other than the class textbook) must be properly cited if used on any assignment. Any student found to have engaged in academic misconduct on a graded assignment or exam may be assigned a zero for that assignment, assigned an F in the course, and/or reported to the Dean of Students' Office of Student Conduct.

### **Accommodations for Students With Disabilities:**

If you have a disability for which you are or may be requesting accommodations, please contact both the professor and the Office of Academic Support Services, University Center room C212 (610-758-4152) as early as possible in the semester. You must have documentation from the Academic Support Services office before accommodations can be granted.

## Tentative Schedule:

Week of Jan. 14:	Chapter 1: Discovering the Night Sky
Week of Jan. 21:	Chapter 1 cont.
Week of Jan. 28:	Chapters 2–3: Gravitation; Light and Telescopes
Week of Feb. 4:	Chapters 3–4: Telescopes; Atomic Physics and Spectra
Week of Feb. 11:	Chapter 5: Formation of the Solar System
	<b>Exam 1 Feb. 15</b>
Week of Feb. 18:	Chapter 6: Earth and the Moon
Week of Feb. 25:	Chapter 7: Other Terrestrial Planets
Week of Mar. 4:	Chapter 8: Outer Planets
Week of Mar. 11:	Spring Break
Week of Mar. 18:	Chapter 10: The Sun
Week of Mar. 25:	Chapter 11: Characterizing Stars
	<b>Exam 2 March 29</b>
Week of Apr. 1:	Chapters 12: The Lives of Stars
Week of Apr. 8:	Chapters 13: The Deaths of Stars
Week of Apr. 15:	Chapter 16: Galaxies
Week of Apr. 22:	Chapter 18: Cosmology
Date?	<b>Final Exam</b>

This syllabus is only a tentative outline of the course. The grading policy, dates of exams, or the topics covered in class may change as needed.