

ASTR305: Astronomy and the Media

Spring 2015

Lecture/Discussion: TTh 2:00-3:15, Room CSS2400
Discussion sections in Room CSS2428



Instructor: [Prof. Andrew Harris](#)
email: [harris @ astro.umd.edu](mailto:harris@astro.umd.edu) (do not include spaces when you type this!)

Office: PSC 1164, (301) 405-7531
Office Hours: T 3:15-4:15 and by appointment (this works best)

Teaching Assistant: Ms. Marie Bernard

email: [christiannembernard @ gmail.com](mailto:christiannembernard@gmail.com) (do not include spaces when you type this!)

Office: CSS 1250

Office Hours: TTh 1:00-2:00 and by appointment

Textbook and readings:

No textbook is required, but any introductory Astronomy textbook is strongly recommended. Much of the class material will be from the web, including web (or print) access to the Washington Post and New York Times, and other sites.

Course Description

It is quite feasible for non-scientists to use the news media to maintain contact with scientific progress if they first master the key critical thinking skills used by scientists and remain aware of how the media filters the presentation of scientific news. The goal in this course is for you to learn how to utilize the media to understand and keep abreast of scientific research long after you leave this class and the University.

We will simultaneously address the questions of:

- How and why scientists conduct research in the modern world.
- How and why news media filter and choose which science to present to the general public.
- How and why institutions, government, pressure groups and individual scientists influence the process.

The basic course structure will be a series of 1-2 week case studies on science news stories, pairing in-depth reviews of the scientific background with relevant media coverage. We will analyze the motivations that scientists, journalists, governmental organizations, and advocates have. When appropriate, we will venture outside of astronomy to cover scientific topics that have high impact on our lives. This class will help students develop the skills and a strategy necessary to use the science media for continual learning throughout one's life.

Class information links

- [Approximate lecture schedule](#)
- Assignments and other materials are on the [class ELMS page](#)

Course expectations

Lecture attendance: The entire class meets for lecture/discussion sessions in CSS 2400 on TuTh from 2:00-3:15 PM. Attendance is required unless you have an excused absence as defined by the University (see [below](#)). Prof. Harris will lead the lectures but you will be expected to raise questions and participate in discussions. You should read over the material before lecture and be prepared to discuss it. Another reading is recommended after lecture. You should study your class notes sometime before the next lecture to make sure that everything is clear. You are encouraged to ask questions in class -- any question you have is certain to be one others have -- during office hours, or over email.

Discussion section attendance: Subsets of the class meet for class time focused on discussion and group work in CSS 2428. You must attend the discussion section you have enrolled in. Attendance is required unless you have an excused absence as defined by the University (see [below](#)).

Study Habits: Study wisely and ask for help if you need it. Please ask Prof. Harris or the TA if you have questions. If you just cram the night before assignments or exams, you probably will not do very well. It is better (and easier) if you keep up with the material on a daily basis. If you have questions, please see Prof. Harris or your TA. *We are here to help you learn.*

Communication: The main channel for communication outside lecture and discussion sections will be through the ELMS course web pages. Reading assignments, writing assignments, and grading results will all be posted there. Either direct email (see top of page) or messages through ELMS are the best way to contact the course instructors.

Grading

Grading is on a point scale with different assignments weighted as shown in the table. A description of each of these components is contained in this syllabus.

ASSIGNMENT	Quizzes and brief homeworks	Writing Assignments	Discussion Section	Midterm Exam 1	Midterm Exam 2	Final Exam	Total
------------	--------------------------------	------------------------	-----------------------	-------------------	-------------------	---------------	-------

PERCENTAGE	25%	20%	15%	10%	10%	20%	100%
------------	-----	-----	-----	-----	-----	-----	------

The Midterm and Final Exams are Major Scheduled Grading events defined in the University's policy on attendance (<http://www.president.umd.edu/policies/v100g.html>). Exam grades are adjusted upward, if need be, so the median score is at least 75%. Letter grades will be assigned based upon your cumulative score. Here is how your grade will be determined from your point total in the class.

Letter Grade	Percentage
A	87.5%-100%
B	75.0%-87.5%
C	62.5%-75.0%
D	50.0%-62.5%
F	< 50.0%

Plus/minus grades will be given within each letter grade for scores near the top and bottom of the percentage ranges.

This point scale makes it possible for everyone in the class to do well. For example, if everyone scores above 75% in the course, everyone would receive either an A or a B letter grade. Any adjustments to the scores will make it easier to get a given grade, never more difficult.

Quizzes and brief homeworks

A major component of this class is discussion of readings of background material and published matter. There will be approximately weekly quizzes on readings and lecture material at the beginning of class, along with associated brief homeworks. Figure that there will be something every lecture, then be happy (or not) when we skip.

Writing assignments

There will be four writing assignments for this course, available from the Assignments link on the class ELMS page.

All assignments must be typed and turned in as hard copy by the end of class on the assignment due date. The format is single-spaced 12 point text on 8.5x11 inch paper with 1 inch margins, with your name at the top right of the page outside the 1 inch margin. If for whatever reason, the University is *officially* closed on the due date, the due date shifts to the next lecture date. Except by prior special arrangement with Prof. Harris electronically mailed versions of your assignment without advance arrangement will not be accepted. Assignments turned in after the lecture ends will be considered late and will receive 20% of the credit at most until 24 hours after the end of lecture, and 50% credit at most until the next lecture; no credit will be given for assignments handed in more than one lecture

late. If you have an excused absence that prevents you from handing in your assignment on time, you must document it in writing (see [Attendance and Absences](#), below) and arrange to have the assignment turned in as soon as possible, but no later than during the next lecture.

Although you may discuss the assignments with your friends, the final writeup **must be your own work in your own words**. Copying from a friend's assignments, copying from a book, or allowing a friend to copy your assignment is academic dishonesty (see [Academic Integrity](#), below) and will not be tolerated in this class. If you consult a reference other than the course text, please acknowledge it in your assignment - *this includes websites!*

Discussion section

The discussion sections promote close examination of topics through teamwork and other interactions that are more intensive than possible with the entire class. Participation at individual and team levels is consequently very important, and forms the basis for grading credit.

Midterm exams

There will be two in-class 75-minute midterm examinations, held during class in CSS 2400 on Feb. 24 and Apr. 7. These exams are closed book with no notes allowed. The schedule of lectures included in this syllabus shows what material will be covered on the midterm exam. The midterm exam is a Major Grading Event (see policy on [attendances and absences](#)).

If for whatever reason, the University is *officially* closed on the exam date, the exam date shifts to the next lecture date.

Final Exam

According to the University calendar, **the final exam for this course will be held on Monday, May 18, from 10:30 AM to 12:30 PM in CSS 2400.** This final exam is cumulative: it will cover *all* material discussed in this course. Material not covered by the midterm exams (see [Lecture Schedule](#)) will be somewhat emphasized in the final exam. This exam is closed book with no notes, but do bring a calculator. The final exam is a Major Grading Event (see policy on [attendances and absences](#)).

Extra Credit

There will be no extra credit assignments in this class.

Attendance and Assessment/Examination Policy

Please review the University's Attendance and Assessment Policy at <http://www.umd.edu/catalog/index.cfm/show/content.section/c/27/ss/1584/s/1540> and the University policy on medically-necessitated absences at <http://www.president.umd.edu/policies/v100g.html>. Some basic points for this class:

- If you need to invoke an excused absence, you must do so in writing and furnish supporting documentation.
- You must notify Prof. Harris of the reason for an excused absence as soon as possible. This will include sending Prof. Harris email or leaving a voicemail message **as long as possible before** absences from exams or other deadlines. For absences known far in advance (for instance, religious observance or participation in activities at the request of University authorities), you must notify Prof. Harris by the end of the schedule adjustment period.
- The midterm exams, writing assignment deadlines, and final exam are Major Scheduled Grading Events for this class.
- A prolonged absence in the sense of the University's policies on attendance and absence is two or more consecutive lectures.
- If you will be absent on a day an assignment is due you may hand in writing assignments early, either to Prof. Harris or in his mailbox in the Department office. A classmate may turn in your assignment for you if you are able to attend the class in which it is due (but please understand the University's policies on Academic Integrity and its potential implications before you do this).
- If you have a medical or other excused absence for a single lecture that coincides with an assignment deadline, and wish to turn in assignments up to one class meeting later, the policy in Sec. II.A. of <http://www.president.umd.edu/policies/docs/V-100G.pdf> applies.
- Requesting to have three or more late assignments or in-class exercises accepted is possible only with written documentation justifying the request, and the consent of the instructor (see Sec. II.B.1 of <http://www.president.umd.edu/policies/docs/V-100G.pdf>).
- Exams on alternative dates or for make-up are possible only in cases of excused absences. When possible, exams will be given **before** the regularly-scheduled exams. For unexpected absences from the midterm or final exams, it is your responsibility to contact Prof. Harris to discuss make-up work within 48 hours of the missed exam.

Academic Integrity

The academic community at the University abides by a Code of Academic Integrity. Acts of academic dishonesty include cheating, fabrication, facilitating academic dishonesty, and plagiarism. Activities such as cheating on exams or quizzes, copying homework from a friend or book, allowing your homework or paper to be copied, and submitting forged excuses for absences from exams are violations of this code. If we suspect that an incident of academic dishonesty has occurred, we will turn the case over to the Student Honor Council to investigate and resolve. If the suspected party is judged 'responsible' for the act(s) of academic dishonesty, the normal sanction is a course grade of 'XF' which denotes failure due to academic dishonesty. This grade is recorded onto the student's academic transcript. The Code of Academic Integrity can be found in the Academic Info section of the Schedule of Classes. It is printed in full in the Undergraduate catalog and on the web at <http://www.president.umd.edu/policies/docs/III-100A.pdf>. Please refer to this Code if you have further questions about what is construed as academic dishonesty. **We are very serious about this.**

Class Web Page

The World Wide Web is a very useful resource that we will make use of in this class (e.g., students will be asked to use the internet for much of the reading). The primary web connection for enrolled students is the University's ELMS page found by logging into <https://elms.umd.edu>. If you have difficulty

accessing the internet, please discuss this with Prof. Harris before the end of the schedule adjustment period.

Laptop computer policy

In principle, laptops can allow you to take notes faster and access the class website. In practice, they are frequently distracting and used for non-class purposes. Laptop displays of non-class material can be very distracting for other students who have a view of your screen. In this class, if you use a laptop:

1. You must sit in the far back row or on the sides with no one behind you to minimize distractions to other students.
2. You must turn the sound off and not use headphones.

If, despite these approaches, the use of laptops turns out to be too distracting for the class as a whole, Prof. Harris may need to ban them entirely. Let's hope that doesn't happen.

There is no need to use phones or other mobile devices during class, even for texting. Please refrain.

Special Circumstances

Students with a documented disability should inform Prof. Harris as soon as possible (preferably on the first day of class, and certainly by the end of the schedule adjustment period) so that appropriate academic accommodations can be made.