

# ASTR 1020: Stellar & Galactic Astronomy

## Lab Syllabus

Summer 2017 \* Langdale Hall 721

**Labs begin on June 7<sup>th</sup>.**

**Student Materials:** Bring the following materials to class every lab period,

- Activities in Astronomy, 2013 Edition, by John W. Wilson,
- Pencils & Eraser,
- Scientific calculator (not a cell phone!).

**Attendance:** Students must attend the lab section for which they have enrolled. It is expected that you arrive on time to lab. Late by 10 minutes or less will result in the loss of a point, 20 minutes or less will result in two points lost and 30 minutes or less will result in three points off that week's lab. If you are late by more than 30 minutes, you will not be allowed to participate in that week's lab. Because many labs are full, students **cannot** attend another section to make up a missed lab class. However, your lowest score will be dropped.

**Honesty Policy:** Students are expected to follow the honesty policies of the university. Any work that does not represent your own efforts will receive a score of zero. When group work is done, it is expected that each student in the group will reply to questions using their own words. Therefore, **do not copy other student's lab work or observations.**

### Lab Grades:

- Lab work is to be completed in class and turned in at the end of each lab period. Late labs or lab work done outside of class will not be accepted.
- Each completed lab will be scored on a scale of 0-10 points. Your lowest lab score will be dropped. Therefore, if you miss lab for any reason that will become your dropped score.
- Your average lab score will count as 25% of your overall ASTR 1020 grade.
- Failure to attend at least half of the lab classes will result in an F for the entire course because this is a lab science and lab attendance is required. So if you make an A in lecture but do not regularly attend lab you will fail the course.

**Lab Website:** More information about labs, observing sessions, teaching schedules, etc. can be found at <http://www.astro.gsu.edu/lab>

## Tentative Weekly Schedule

Dates	Description
June 7	Lab 11: Rotation of the Sun <b>TERM PROJECT:</b> Project Medley (20 pts). Lab 28: Visiting an Observatory Both are <b>required</b> and cannot be dropped. Both are <b>due</b> on the last day of lab.
June 12	Lab 10: Spectroscopy and Atomic Structure
June 14	<i>Handout:</i> CLEA: Spectral Classification <b>Choose Project Medley Topic</b>
June 19	Lab 12: Eclipsing and Spectroscopic Binary Stars
June 21	<i>Handout:</i> CLEA: Photometry of the Pleiades <b>Turn in Semester Project Medley Outline</b> (5 points)
June 26	Lab 13: Ages and Distances of Star Clusters
June 28	Lab 14: The Period-Luminosity Relationship
July 3	<i>Handout:</i> CLEA: Radio Astronomy of Pulsars
July 5	<b>4<sup>th</sup> of July Break! NO LABS MEET!</b>
July 10	Lab 15: Hubble's Law
July 12	<i>Handout:</i> Galaxy Classification (Subject to Change!)
July 17	<i>Handout:</i> Presentation Evaluations (Subject to Change!) <b>Turn in Semester Project Medley</b>
July 19	Lab Evaluation, <b>Turn in Lab 28:</b> Visiting an Observatory. To receive credit for this lab, you must turn in the completed and signed page from Lab 28 in your lab manual. Your lab instructor will announce, in lab, evening observations to be held on campus to complete this requirement. OR you can attend any public night at a local observatory such as <a href="#">Fernbank Science Center</a> , or <a href="#">Hard Labor Creek Observatory</a> .

Lab Instructor's Name: \_\_\_\_\_

Lab Instructor's Email: \_\_\_\_\_

Lab Instructor's Office: \_\_\_\_\_

If you encounter problems that your lab instructor cannot handle, please contact your lecture class instructor and/or the Astronomy Lab Manager, Dr. John Wilson ([wilson@astro.gsu.edu](mailto:wilson@astro.gsu.edu)).