

GEOLOGY 1447
Meteorology

Western Texas College

NOTE: This syllabus may be changed, altered or amended at any time at the instructor's discretion if it is deemed necessary.

- I. Basic Course Information
 - A. This is a laboratory course and all lab assignments will be conducted in tandem with the lecture portion of the course. More detailed information on labs can be found on the departmental Moodle site. There are no prerequisites for Geology 1447 other than to be able to read and write on the college level. This class covers, among other topics, layers and characteristics of the atmosphere, severe storms, clouds, fronts and boundaries and weather map interpretation. There is a textbook and a lab manual for the course but we will also use "near real time" weather events from certain web sites to discuss weather patterns and phenomena.
- II. Student Learning Outcomes (SLO)
 - A. Students will demonstrate an ability to effectively use the computer to communicate with the instructor and other students, to perform lab exercises and to access and take exams on line. This will be assessed by communiqués from the student to the teacher and by taking note of the log on activity each student has engaged in.
 - B. Students will be able to use and explain the "hand-twist" model that describes air circulation in high and low-pressure zones. Assessment will be questions on quizzes.
 - C. Students will be able to read, interpret and explain symbols and the conditions those symbols represent on a weather map. Assessment will be made using questions on quizzes.
- III. Grade and Textbook Information
 - A. The 3 categories of grades in this course are below.
 1. **Major exams – 50 %**

There are four of these given during the semester and each one will cover the indicated chapters in the text and the corresponding chapters in the lab manual. Exams will be open for 5 days and you will have 90 minutes once you begin. Exams may be taken only once and will not be reset for any reason but the lowest grade will be dropped at the end of the semester.
 2. **Weekly Quizzes - 20%**

These will be short (5-15 questions) over the current week's chapter in the text and will be open for 5 days. You will have 30 minutes to complete the quiz once you begin. There will be no lab questions on these quizzes. Quizzes may be taken only once and will not be reset for any reason but the lowest grade will be dropped at the end of the semester.

3. **Final Exam – 30 %**

This is the only grade that requires a proctor. I will give you more information on that as the course progresses. **No books, manuals, or other resources may be used on the final exam.**

- B. Books - Books may be purchased either at the WTC bookstore or through the publisher, the American Meteorological Society (AMS).

Note that both the text and the lab manual are electronic editions and may be purchased from either the bookstore or the AMS. **If you want a hardback text, you must go to the website and order from the AMS.**

Do not try to buy used books from another source. These are new editions and the AMS sells only to college bookstores. Information is below.

Weather Studies Student ePackage

- *Weather Studies: Introduction to Atmospheric Science, 5th Ed. eTextbook*
 - *eInvestigations Manual 2014-2015 & Summer 2015*
 - *RealTime Weather Portal Access*
 - *eGlossary*
- ISBN: 978-1-935704-76-8

Weather Studies Student Package (print)

- *Weather Studies: Introduction to Atmospheric Science, 5th Ed. Printed Textbook*
 - *eInvestigations Manual 2014-2015 & Summer 2015*
 - *RealTime Weather Portal Access*
 - *eGlossary*
- ISBN: 978-1-940033-00-6

If you have to take the final at a time other than that above, I must have written permission from the dean of instruction.