

Stratigraphic Concepts & Applications (GEOS 5333)

McCoy College of Science, Mathematics, and Engineering

Fall, 2026

General Course Information

- Lecture Meetings: Tuesday, Thursday | 5:00 pm – 6:20 pm | Bolin Hall 125
- Laboratory Meetings: Thursday | 3:00 pm – 4:50 pm | Bolin Hall 125
- Course D2L Site: We will only use the main course site for the lecture section, there will be no content in the laboratory section site.
 - [Stratigraphic Concepts & Applications D2L Site](#)

Instructor Information

- Dr. Steven J. Rosscoe | steven.rosscoe@msutexas.edu | 940.397.4448
Office Hours: MWF 8-8:50 am, 10-10:50 am | Bolin Hall 101A
Virtual Office Hours: M 10-10:50 am, By Appointment | [Zoom Office Hours Link](#)

Course Description

This course provides an in-depth investigation of stratigraphic principles and their applications in the geosciences. The core material of the course will cover traditional lithostratigraphy (including geophysical logs and seismic surveys), biostratigraphy, chemostratigraphy, and sequence stratigraphy. These techniques will be applied to use in correlation of strata across basins. The focus of the course may shift, within the primary topics, to emphasize material best fit to the needs of the students and their thesis work. Lecture content is supplemented by laboratory activities involving well logs, seismic surveys, biostratigraphic data, and core.

Course Learning Objectives

The successful completion of this course will be evaluated around the following course learning objectives. Each of these course learning objectives include aspects of both content knowledge and skills development. Students will:

1. Review the basic elements of sedimentary geology and stratigraphy.
2. Learn and develop field techniques and notetaking.
3. Learn correlation techniques and apply them to real world interpretations of depositional settings and geologic events.
4. Collect stratigraphic data from the field and correlate that data to other surface and subsurface data.
5. Prepare a formal scientific presentation about a rock unit in Texas and its complete stratigraphic history, value, and correlations.

Instructional Materials

There is no required textbook or lab manual for this course. While that is the case, for those with relatively little experience in the geosciences or sedimentary geology the following textbooks and resources could help. ***You will be required to use specific software during the course.**

Suggested Textbooks (Not Required)

These are some of the most useful textbooks in my collection. For those of you with a limited background in sedimentary geology, you may find it useful to purchase one of the following:

- **Boggs, Sam. 2012.** Principles of Sedimentology and Stratigraphy, Fifth Edition. Pearson Prentice Hall. 585 p. ISBN 9780321643186
- **Prothero, D. R. and Schwab, F. 2014.** Sedimentary Geology: An Introduction to Sedimentary Rocks and Stratigraphy, 3rd Edition. W. H. Freeman and Company, 593 p. ISBN 9781429231558

For those who are new to sedimentary geology, a PDF copy of my Historical Geology Lab Manual (Rosscoe, 2026) is available in D2L. It will likely be a good resource for you when working on labs.

Required Software Applications

- Microsoft Office: Word, PowerPoint [Free Access to Microsoft Office 365](#)
 - Required for completion of laboratory activities.
 - Full versions are better – Bolin 105 is available to you with these installed.
- PDF Reader
 - PDFs are used to provide some course materials; a browser PDF reader or Adobe Acrobat will be necessary to view them.
- Adobe Illustrator
 - For the assignments where it is required Adobe Illustrator is installed on the PC in Bolin Hall 113a. You will have to share access as it is an expensive license.

Grading Information

The formal grade for this course is determined by your performance on examinations, presentations, lab activities, and field trip participation and related activities. Your grade is calculated by dividing the points you earned during the semester by completing assignments by the total number of points possible in the semester. The letter grade for the course follows the traditional university style.

Table 1: Allocation of Points by Assignment Type

The table below shows the total number of points for each major category of assignment that are possible this semester. For more details about the assignments see the section for that assignment in this portion of the syllabus.

Assignments (Quantity)	Points
Examinations (4)	300
Stratigraphy Presentation (1)	100
Lab Activities (12)	240
Field Trips and Post Trip Activities	60
Total Points	700

Table 2: Points, Percentage, and Letter Grade Values

The table on the following page shows the point-value and percentage-value required to reach a particular letter grade in the course. The table reflects the optimal running of the course where there are no missed days or activities. The instructor reserves the right to change the point distributions to reflect such changes. The percentage requirements will remain unchanged throughout the semester. Percentage grades are rounded to the nearest whole percent.

Grade	Points	Percentage
A	630 and up	90% and up
B	560 to 629	80% to 89%
C	490 to 559	70% to 79%
D	420 to 489	60% to 69%
F	Less than 420	59% or less

Examination Information

During the semester, there will be four examinations. Two examinations will cover the bulk of the material in the course and will be worth 100 points each. Two examinations will cover smaller portions of the course material and will be worth 50 points each. Each examination will consist of written response questions that will require complete and grammatically correct sentences. When constructing answers to these questions, you will need to aim for one to two sentences per point in the question's point-value. Most examination questions will be centered on lecture material, while some questions will focus on laboratory material. Examinations are take-home and are to be typed in Microsoft Word. They will be submitted in D2L through with Turn-It-In to evaluate peer copying and the use of AI. Only your course notes and the suggested text books can be used as you complete the examinations. No use of other humans, no use of any sources of information from the internet, and no use of AI is permitted. The exams, their point-value, their content, release dates, and due dates are found below.

- Examination 1 (100 points): Sedimentary Rocks (Weeks 1 to 5) – exam releases 09/26/26 and is due 10/02/26 at 11:59 pm.
- Examination 2 (50 points): Stratigraphy (Weeks 6 to 7) – exam releases 10/09/26 and is due 10/16/26 by 11:59 pm.
- Examination 3 (100 points): Correlation (Weeks 9 to 13) – exam releases 11/20/26 and is due 11/30/26 by 11:59 pm.
- Examination 4 (50 points): Applications of Stratigraphy (Weeks 14 to 15) – exam releases 12/04/26 and is due by 12/08/26 by 11:59 pm.

Stratigraphy Presentation Information

As a graduate student in the geosciences, you must be able to demonstrate your ability to gather, assess, process, and present scientific information. After our lecture on Texas Stratigraphy (currently scheduled for October 6th), you will select a rock unit (formation or group) that is relevant to your thesis direction or is of interest to you. We will only have one presentation per rock unit, so chose first to get your choice. If your choice is already taken you will need to select

another unit. You will source information from only peer-reviewed journal articles (at least 6) that you source using the Moffett Library search function. From the information you collect you will prepare a ten-minute oral presentation on your rock unit using PowerPoint for the slides. The presentations will be given during the last laboratory period of the semester (December 3rd). You will be evaluated by your peers and the professor with a rubric provided in D2L. The presentations will require the following elements:

- The unit's name and in modern usage:
 - The defined base of the unit.
 - The defined top of the unit (or base of the unit above it).
 - The stratotype location (or best outcrop).
 - Its membership in larger lithologic units (if it's a formation, is in a group; if it's a group, is it in a supergroup).
 - Its sub units (formations, members, beds, that are found within it).
 - The specific geologic age of the rock. Numerical age if it has been confidently age dated as well.
- The history of the unit's name, stratigraphic position, subunits, and higher groupings.
- The geographic location of the surface exposures of the unit (where in the state is it exposed).
- The geographic location of subsurface deposits being studied (caves, oil fields, mines, etc.)
- The paleogeographic and tectonic conditions of the region at the time the rock unit was deposited.
- The depositional environment(s) of the unit.
- A complete description of the lithology of the rock unit.
 - General composition, texture, and classification.
 - Variation of composition, texture, and classification laterally and vertically.
 - Fossil content, if any.
- The significance of the rock unit (why is it important, why is it being studied, perhaps even why it isn't being studied and why it should be).
- A slide with all of your references.
 - To demonstrate that you found all of your references using the Moffett Library, you will need to provide the instructor with a document containing screen captures of each of your references in the Moffett Library search engine. This will be submitted in D2L.

You will present your presentation to the full class for evaluation and practice in giving professional style talks. Presentation PowerPoints will be submitted in D2L by 11:59 pm on the day before the presentations. More information on making good presentations and preparing for your talk will be provided in D2L.

Laboratory Activities

Throughout the semester you will complete 12 laboratory activities (subject to change due to unforeseeable circumstances). These activities are designed to build your familiarity with sediments and sedimentary rocks, field and lab techniques, and correlation skills. It is imperative

that you complete these activities by their due dates, attendance to lab is a requirement. Each lab is worth 20 points toward your grade. Labs 1 to 5 will have a substantial group component to take advantage of the diverse nature of the knowledge base for those in our class. Those with more experience with geology and sediments and sedimentary rocks will be able to sharpen their skills while helping the less experienced in the class develop what may be new skills to them. Labs are due at the start of the next laboratory period.

Field Trips and Post Trip Activities

There will be two required field experiences in this course. These experiences are designed to help you develop your field skills and apply them to specific geological problems. Attendance is required to each field activity. An assignment follows each field experience to demonstrate your skills and field potential. The details on the two trips, their point-values, and assignments can be found in the table below. Assignment descriptions are found below the tables.

Date	Time Window	Field Experience	Assignment
Saturday 10/03	10 am – 3 pm	MSU Sed/Strat Field Day (MSU Campus)	Attendance (5 pts) Field Book Ref. Page (10 pts) Field Skills Challenge (10 pts)
Saturday 10/31	8 am – 5 pm	Arbuckles Stratigraphy (Davis, Oklahoma)	Attendance (5 pts) Field Notes Copy (15 pts) Measured Section (15 pts)

- Attendance (2 @ 5 points each) – Attendance is required to field experiences; you will get 5 points for attending each.
- Field Book Reference Page (10 points) – You will construct, in your field notebook, a field reference page that you can use to aid in measurements and observations. You will affix this reference page into your field notebook. A scanned or photographed copy will be submitted in D2L and graded. The grading rubric will be made available before the due date.
- Field Skills Challenge (10 points) – As part of the field day you will be given a series of field tasks to complete (after being trained, of course). Every student must complete the field skill challenge. Grading will be based on effort and accuracy of your results. Best results from each class wins a glorious prize (prize may not actually be glorious, but the glory of winning will be).
- Field Notes Copy (15 points) – You will scan or photograph a copy of your field notes from the Arbuckles field trip. Your field notes will be graded on completeness and accuracy. You will need to include all required elements of a proper field notebook entry. The grading rubric will be provided in advance of the due date.
- Measured Section (15 points) – You will prepare a measured section from your field work in the Arbuckle Mountains. You will construct a full and detailed figure using appropriate symbology in Adobe Illustrator. You will submit a PDF document in D2L. The measured section will be graded for completeness, accuracy, and how well you keep to the provided standards. The grading rubric will be provided in advance of the due date.

Extra Credit

There are no planned extra credit activities for this course. It is possible that extra credit assignments may be assigned as the semester progresses at the discretion of the instructor. Extra credit assignments are assignments that have due dates; no late credit will be given.

Late Work Policy

This is a graduate level where nearly all assignments have a week or more of lead time before their due date. ***No late work will be accepted.** Missed labs and examinations may be made up with a legal, paper-documented, excuse.

Make-Up Work/Tests

For legal, paper-documented excuses make-ups for labs and examinations can be completed. Make-up work should be arranged for in advance wherever possible. The instructor will give you a new deadline that is reasonable for the course timeline. ***No make-up work (lecture or lab) will be allowed beyond 10 days past the original deadline.**

No Substitute Assignments

You must complete the assignments, laboratories, and examinations presented in this syllabus. ***No substitute assignments will be allowed to compensate for poor performance or missed deadlines.**

Course Grades and Grade Bumps Policy

In my courses, a grade is earned by accumulating points throughout the semester. The grade you earn in the course is determined by the number of points you earn through the timely completion of assignments. As such, at the end of the semester, there are no grade bumps given out. Do not ask how or if you can be bumped up to the next letter grade, if you haven't earned the points, you will not be able to get that grade.

If you believe there to be an error in the calculation of your grade, whether it is on a specific assignment or the whole course feel free to ask me to re-evaluate and double check. I will do so happily. For specific assignments, be prepared to give me specific reasons you feel the grade is wrong (which wrong answer do you think was right, etc.).

Instructor Classroom Policies

The following policies are the policies that are integral for our successful completion of the course and should be read thoroughly. If you have any questions, please see the instructor.

Academic Honesty Policy

Academic dishonesty is considered cheating, collusion, and plagiarism. Any unauthorized assistance during the completion of assignments, using on aids beyond those authorized for an assignment, or the use of other people or services to complete assignments is considered cheating. Working with others in a way that is not authorized by the instructor to complete assignments is considered to be collusion. Plagiarism is the use of another person's materials (by paraphrase or direct quotation) without giving them full and clear acknowledgement. The use of

material prepared by another person or agency selling term papers and academic materials is also considered plagiarism. ***If a student is caught cheating, colluding, or plagiarizing on any assignment the assignment grade will automatically be a zero. Two or more violations will result in failure of the course.**

Artificial Intelligence Policy

This course is classified as an ***AI Prohibited Course**. The use of any artificial intelligence (AI) in completing course assignments is NOT allowed. AI in this sense is any technology that summarizes, writes, or answers questions on its own. Recent court rulings have allowed lawsuits to go forward against Chat GPT and other AI operators because it directly plagiarizes the use of others. College is about you learning to write, you developing your voice, and you learning how to process, summarize, and properly cite information. Any use of AI is considered a violation of this academic honesty policy.

Classroom Civility Policy

Learning, especially in science, can be a very challenging process. Learning often requires putting yourself out there and being vulnerable. Science also happens to be at the forefront of information which may conflict with personal beliefs. Your beliefs are yours and nothing will change that, though those beliefs may not get you credit on the exam. We are focused on science and what understandings have been developed in the field. Additionally, no scientist thinks the same way as every other scientist. To develop the best understandings of our universe, we must seek input from all people in the field.

In my classroom, we strive to create an environment where everyone is respected and valued for who they are. We are all here together, learning together, and working toward the same goal. This is not a place for hate of any kind. The use of derogatory language, hate speech, or violence is absolutely unacceptable in this classroom and in any setting related to the course. Learn to work with and value all people. Be civil and treat each other with respect. Do your best to listen to each other, in any conversation. Use of derogatory language, hate speech, or violence will result in removal to the classroom or the course.

Dr. Rosscoe is available to help if you have any concerns or questions about building a positive classroom environment. The campus also has numerous resources related to a safe and welcoming experience at MSU. Also, don't forget the MSU Safety App.

- [Title IX Misconduct](#): Dating violence, sexual assault, sexual harassment, stalking, and other forms of sexual misconduct.
- [Bias Incident Reporting](#): Bias and hate incidents related to race, gender, or sexual identity.
- [Disability Grievance Procedures](#): Discrimination on the basis of disability.

COVID-19 and Illnesses Policy

Since COVID-19, classroom health has been a necessary and probably long overdue focus. While there are no longer COVID-19 policies in place by the university the following procedures are scientific best practices. These same principles can be applied to any viral infection (flu, cold, etc.).

- If you become ill and have symptoms, get tested.
- If you are positive for COVID-19, stay home. It's good for your recovery and good for protecting your peers.
- Illness happens and if you absolutely must be in public, wear a mask. Even a cloth mask reduces the chance you will spread the illness to others.
- If you stay home or miss assignments, be sure to get a doctor's note and excuse. It allows the instructor to help you make things up.

In the case of long-term illnesses or medical situations that will prevent you from attending classes regularly, contact the professor as soon as possible. We will work together to make sure that you can succeed, just make sure it is Doctor-documented. I can't do much to help, if I don't know until the day before the semester ends.

Electronic Devices Policy

Use of electronic devices for taking notes is allowed in my classroom. The use of social media or streaming anything is not an appropriate use of technology during class. If your use of technology is non-educational or is being disruptive to your peers, you will be asked to leave. If you're in the back of the room, ear buds in, and smiling as you watch something on your device, I do notice. Don't be that person.

Recording Classes Policy

***Recording classes is generally prohibited without the professor's explicit permission.** Such recordings, when permitted are for personal use only and may not be uploaded to the internet or otherwise shared, transmitted, or published without the professor's prior consent. Some faculty may not permit recordings of their classes. When it is feasible and appropriate, students may record classes to accommodate disabilities under the Americans with Disabilities Act, with prior approval of Disability Support Services. Such recordings may not be uploaded to the internet or otherwise shared, transmitted, or published.

Desire-to-Learn (D2L)

Extensive use of the MSU D2L learning management system is required in this course. Each student is expected to be familiar with this program as it provides a primary source of communication regarding assignments, examination materials, and general course information. You can log into D2L through the MSU Homepage. If you experience difficulties, please contact the technicians listed for the program or contact your instructor.

Computer Requirements

Taking this course involves the completion of all lecture exams, reading quizzes, and discussions in the course learning management system (D2L). This class requires you to have access to a computer (with Internet access) to complete and upload your assignments. It is your responsibility to have (or have access to) a working computer in this class. ***Assignments and tests are due by the due date, and personal computer technical difficulties will not be considered a reason for the instructor to allow students extra time to submit assignments, tests, or discussion postings.** Computers are available on campus in various areas of the buildings

as well as the Academic Success Center. ***Your computer being down is not an excuse for missing a deadline!!** There are many places to access your class! Our online classes can be accessed from any computer in the world which is connected to the internet. Contact your instructor immediately upon having computer trouble. If you have technical difficulties in the course, there is also a student helpdesk available to you. The college cannot work directly on student computers due to both liability and resource limitations however they are able to help you get connected to our online services. For help, log into D2L.

Inclement Weather Policy

In cases of extreme weather events that delay or close campus and where those delays or closures impact the course:

- If the closure or delay includes lecture meeting time, the lecture will not meet and the lecture schedule for the semester will be modified.
- If the closure or delay includes a laboratory meeting time, the laboratory will not meet and all remaining laboratory meetings for the week will be cancelled to keep the lab sections on the same schedule. Lab due dates and lab quiz dates will be adjusted.
- If due dates are impacted by the delay or closure, they will be rescheduled.
- All changes to the course schedule will be posted, in writing, in D2L.

NOTE: Because all students do not have equal or reliable access to technology and internet, especially in times of inclement weather, we WILL NOT shift to online in cases of inclement weather.

University Policies and Information

The following information and policies apply to this course. Please read each of these policies and ask your instructor if you have any questions.

Important Dates

- First Day of Classes: August 24th, 2026
- Change of Schedule and Late Registration: August 24th-27th, 2026
- Labor Day Holiday, No Classes: September 7th, 2026
- Last Day to File for December Graduation: September 21st, 2026
- Priority Deadline for Filing for May Graduation: October 5th, 2026
- Last Day for "W" (Drops after this date receive "F"): November 23rd, 2026
- Thanksgiving Holiday, No Classes: November 25th-29th, 2026
- Last Day of Classes: December 4th, 2026
- Final Examinations: December 5th to 10th, 2026
- Commencement: December 11th, 2026 (Graduate), December 12th, 2026 (Undergraduate)

Attendance

Students are expected to attend all meetings of the classes in which they are enrolled. Although in general students are graded on intellectual effort and performance rather than attendance, absences may lower the student's grade where class attendance and class participation are

deemed essential by the faculty member. In those classes where attendance is considered as part of the grade, the instructor should so inform students of the specifics in writing at the beginning of the semester in a syllabus or separate attendance policy statement. An instructor who has an attendance policy must keep records on a daily basis. The instructor must give the student a verbal or written warning prior to being dropped from the class. Instructor's records will stand as evidence of absences. A student with excessive absences may be dropped from a course by the instructor. Any individual faculty member or college has the authority to establish an attendance policy, providing the policy is in accordance with the General University Policies.

Change of Schedule

A student dropping a course (but not withdrawing from the University) within the first 12 class days of a regular semester or the first four class days of a summer semester is eligible for a 100% refund of applicable tuition and fees. Dates are published in the Schedule of Classes each semester.

Refund and Repayment Policy

A student who withdraws or is administratively withdrawn from Midwestern State University (MSU) may be eligible to receive a refund for all or a portion of the tuition, fees and room/board charges that were paid to MSU for the semester. HOWEVER, if the student received financial aid (federal/state/institutional grants, loans and/or scholarships), all or a portion of the refund may be returned to the financial aid programs. As described below, two formulas (federal and state) exist in determining the amount of the refund. (Examples of each refund calculation will be made available upon request).

Services for Students with Disabilities

In accordance with Section 504 of the Federal Rehabilitation Act of 1973 and the Americans with Disabilities Act of 1990, Midwestern State University endeavors to make reasonable accommodations to ensure equal opportunity for qualified persons with disabilities to participate in all educational, social, and recreational programs and activities. After notification of acceptance, students requiring accommodations should make application for such assistance through Disability Support Services, located in the Clark Student Center, Room 168, (940) 397-4140. Current documentation of a disability will be required in order to provide appropriate services, and each request will be individually reviewed. For more details, please go to [Disability Support Services](#).

Emergency Aid Resources for Basic Needs

Unexpected life circumstances can affect anyone. If you are experiencing challenges meeting basic needs – such as housing, utilities, food, transportation, healthcare, technology, textbooks, or other life necessities, resources may be available to help. Visit the [Student Emergency Support and Resources webpage](#) to learn more, and explore emergency support opportunities through MSU and how to access them. For additional information, please contact the Office of Student Affairs: Clark Student Center # 108, (940) 397-7500, student.affairs@msutexas.edu.

Campus Carry Rules/Policies

Effective August 1, 2016, the Campus Carry law (Senate Bill 11) allows those licensed individuals to carry a concealed handgun in buildings on public university campuses, except in locations the University establishes as prohibited. The new Constitutional Carry law does not change this process. Concealed carry still requires a License to Carry permit, and openly carrying handguns is not allowed on college campuses. For more information, visit [Campus Carry Rules and Policies](#).

Active Shooter

The safety and security of our campus is the responsibility of everyone in our community. Each of us has an obligation to be prepared to appropriately respond to threats to our campus, such as an active aggressor. Please review the information provided by MSU Police Department regarding the options and strategies we can all use to stay safe during difficult situations. For more information, visit [Safety / Emergency Procedures](#).

Smoking and Tobacco Policy

Midwestern State University seeks to provide a safe, healthy, pleasant environment for its faculty, staff, and students. To this end, the use of tobacco products, including smoke and smokeless tobacco, and the advertising, sale, free distribution, and discarding of tobacco products shall be prohibited in all indoor and outdoor facilities and in all university vehicles. The policy extends to faculty, staff, students, vendors, guests, and visitors.

Alcohol and Drug Policy

To comply with the Drug Free Schools and Communities Act of 1989 and subsequent amendments, students and employees of Midwestern State are informed that strictly enforced policies are in place which prohibits the unlawful possession, use or distribution of any illicit drugs, including alcohol, on university property or as part of any university-sponsored activity. Students and employees are also subject to all applicable legal sanctions under local, state and federal law for any offenses involving illicit drugs on University property or at University-sponsored activities.

Grade Appeal Process

Following the appropriate procedure for grade appeals requires you to speak to your instructor first, so talk to your instructor. Students who wish to appeal a grade should consult the Midwestern State University [Undergraduate Catalog](#).

Course Topic Schedule

The following is the schedule for the lecture and laboratory topics we will study during the semester. This schedule will vary over the semester as some topics may move quicker or slower than expected. ***Note: Changes in the course syllabus, procedures, assignments, and schedule may be made at the discretion of the instructor.**

Week	Dates	Tuesday Lecture	Thursday Lecture	Thursday Lab
1	Aug 24 to Aug 28	Course Introduction & The Basics	Primordial Sediments	01 – The Rock Forming Minerals
2	Aug 31 to Sep 04	Description & Classification of Sediment	Becoming Sedimentary Rocks	02 – Sediments Galore
3	Sep 07 to Sep 11	Clastic Sedimentary Rocks	Clastic Sedimentary Rocks	03 – Clastic Sedimentary Rocks
4	Sep 14 to Sep 18	Carbonate Sedimentary Rocks	Carbonate Sedimentary Rocks	04 – Carbonate Sedimentary Rocks
5	Sep 21 to Sep 25	Miscellaneous Sedimentary Rocks	Miscellaneous Sedimentary Rocks	05 – Miscellaneous Sedimentary Rocks
6	Sep 28 to Oct 02	The Geologic Timescale	Stratigraphy	06 – Field Notes
7	Oct 05 to Oct 09	The Stratigraphy of Texas	The Principles of Stratigraphy	07 – Drafting a Measured Section
8	Oct 12 to Oct 16	No Class Meeting <i>GSA Denver Meeting</i>	No Class Meeting <i>GSA Denver Meeting</i>	No Lab Meeting <i>GSA Denver Meeting</i>
9	Oct 19 to Oct 23	Lithocorrelation	The Challenge of Facies and Unconformities*	08 – Lithocorrelation
10	Oct 26 to Oct 30	Well Log Correlation	Depositional Sequences	09 – Well Log Correlation
11	Nov 02 to Nov 06	Sequence Stratigraphy	Seismic Stratigraphy*	10 – Sequence Interpretation
12	Nov 09 to Nov 13	Biozonation	Correlating Biozones*	11 – Correlation of Biozones
13	Nov 16 to Nov 20	Graphic Correlation	Chemostratigraphy and Magnetostatigraphy	12 – Graphic Correlation
14	Nov 23 to May 27	Stratigraphy & The Petroleum Industry	No Class Meeting <i>Thanksgiving Holiday</i>	No Lab Meeting <i>Thanksgiving Holiday</i>
15	Nov 30 to Dec 04	Stratigraphy & Aquifer Systems	Stratigraphy & Karst Systems	Presentations

Field Trip Dates (Required)

- Saturday, October 3rd – MSU Sed/Strat Field Day @ MSU (combined activity day with 4534).
- Saturday, October 31st – Stratigraphy of the Arbuckle Mountains, Oklahoma.

Final Examination Block

- The final exam block is Tuesday, December 8th, 2026, from 5:45 pm to 7:45 pm. The exam is online, in person attendance is not required. I will be available in my office at that time.

Course Due Dates in Chronological Order

The following table lists the due dates of each assignment in the course. All items are due at the dates and times listed in the table below. ***NOTE: Changes in the course syllabus, procedures, assignments, and schedule may be made at the discretion of the instructor.**

Due Date	Assignment
Thursday, September 3 rd , 2026	Lab 01 – Rock Forming Minerals Due @ 3:00 pm
Thursday, September 10 th , 2026	Lab 02 – Sediments Galore Due @ 3:00 pm
Thursday, September 17 th , 2026	Lab 03 – Clastic Sedimentary Rocks Due @ 3:00 pm
Thursday, September 24 th , 2026	Lab 04 – Carbonate Sedimentary Rocks Due @ 3:00 pm
Thursday, October 1 st , 2026	Lab 05 – Miscellaneous Sedimentary Rocks Due @ 3:00 pm
Friday, October 2 nd , 2026	Examination 1 Due @ 11:59 pm
Thursday, October 8 th , 2026	Lab 06 – Field Notes Due @ 3:00 pm
Saturday, October 3 rd , 2026	Field Experience 1: Sed/Strat Field Day (10 am – 3 pm)
Friday, October 16 th , 2026	Examination 2 Due @ 11:59 pm
Monday, October 19 th , 2026	Field Book Reference Page Due @ 11:59 pm Field Skills Challenge Due @ 11:59 pm
Thursday, October 22 nd , 2027	Lab 07 – Measured Sections Due @ 3:00 pm
Thursday, October 29 th , 2027	Lab 08 – Lithocorrelation Due @ 3:00 pm
Saturday, October 31 st , 2026	Field Experience 2: Arbuckles Stratigraphy (8 am – 5 pm)
Thursday, November 5 th , 2026	Lab 09 – Well Log Correlation Due @ 3:00 pm
Monday, November 9 th , 2026	Field Notes Copy Due @ 11:59 pm Field Measured Section Due @ 11:59 pm
Thursday, November 12 th , 2026	Lab 10 – Sequence Interpretation Due @ 11:59 pm
Thursday, November 19 th , 2026	Lab 11 – Correlation of Biozone Due @ 11:59 pm
Monday, November 30 th , 2026	Examination 3 Due @ 11:59 pm
Wednesday, December 2 nd , 2026	PowerPoint Presentation Submitted by 11:59 pm
Thursday, December 3 rd , 2026	Lab 12 – Graphic Correlation Due @ 11:59 pm Presentation in Lab (3 pm – 5 pm)
Monday, December 8 th , 2026	Examination 4 Due @ 11:59 pm