Statistics MATH 235
Section 80 (online class)
Syllabus Fall 2025

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Phone: 618-468-4844
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Office hours (CM 217): Monday through Thursday 8:30 – 9:30 am; Monday and Wednesday 11:00 – noon; Tuesday and Thursday 12:45 – 2:00 pm
Tutors Available: Online and in-person tutoring with Brandy and company in the Math & Science Resource Center, CM 233, email bkribs@lc.edu or call 618-468-4118 for more information; more information given below

This is an online class. That means you will work on your own, using the resources I describe here. For each section, you should complete the Class Notes, including mentioned worksheets. Only then should you attempt the MyStatLab (MSL) homework. **There is *no* in-person component of the class (*except for exams* for which you will come to campus).**

We will cover the material with a mix of class notes, ungraded worksheets, and questions. Please feel free to ask questions and pose comments through email. My lessons (via Class Notes) contain lots of examples similar to the homework problems. You will save yourself much stress by studying the notes before you start your homework. Do the homework promptly and thoroughly. Practice will help you immensely.

You will do all of your homework assignments through MyStatLab (MSL). Exams will be taken at a campus testing location and be paper-and-pencil. Homework will prepare you for exams and build on each other so it is crucial that you keep up with the assignments. You can work your homework assignments at any computer with internet access.

You will want a three-ring binder notebook to keep your notes. I have available Class Notes which you should complete before doing the graded MSL homework. You will have a MyStatLab (MSL) assignment to complete for each section. (However, chapters 1 through 3 are condensed into one assignment each.) You should keep a dedicated spiral notebook or section of your larger binder for your organized, labeled (online) homework. Do *not* just use scraps of paper as you need it. Keep all work in one place to make it easier to study and ask questions.

Website (www.stlmath.com):
My Website has many resources for you. You will use it to get resources I made or when you need clarification of a policy. If I refer to "the Website", I am referring to www.stlmath.com. You can access everything you need from here including the following.

-- Class Notes (including videos for most and completed PDF versions for others) which work you through definitions and examples
-- Class schedule including exam schedule and important dates
-- Syllabus, handouts, worksheets, and solutions to some of the worksheets
-- Archived worksheets that may help you review or extend certain topics
-- Links to the publisher-provided MyStatLab (MSL) Website and Blackboard

Textbook, Calculator, and MyStatLab:
· *Statistics: Informed Decisions Using Data*, Michael Sullivan, 2021, sixth edition. We will cover most of chapters 1 – 14. The book is available through MyStatLab (MSL, described later) in electronic form. It is possible to have access to MyStatLab and use the electronic book instead of purchasing a paper copy.

· MyStatLab (MSL) is an offshoot of MyMathLab (MML) which you may have used in another math class. MyStatLab (MSL) is virtually identical to MyMathLab (MML) except that it has some statistical capabilities. I often refer to either product as "MyMathLab".

· Your college fees paid for access to MyStatLab (MSL). The MyStatLab Website (http://www.mymathlab.com) provides practice problems and tutorials. There will be graded homework assignments from MSL. If you used MSL or MML for a previous class, you can use your previous login (username and password) information. If you do, be sure you have given them your current email address. Otherwise, create a new account. Below you will see how to access MSL. The process is dramatically different than in the past.

· **To start up MSL, we are using Willo, a system from the bookstore's parent company Follett. This is fairly new to me as it may be to you, so please have patience.** Start on the Blackboard (Bb) page for your class and follow the link (on the home page for our class) that is labeled Pearson Course Materials. This link should take you to MSL where you need to enter your previous credentials for MyMathLab or enroll as a new user. After you complete the log-in process, the Pearson Course Materials link in Bb will take you directly to the MSL site. In the future, you can log-in to their site directly at www.mymathlab.com. If Blackboard is down for some reason, remember that the MSL site is still available at www.mymathlab.com. **You must be enrolled by September 8.** This new process does *not* require you have an access code or course ID as we have done in the past. **If something goes wrong at any time and you are unable to do homework, contact customer support and tell me immediately so it can be remedied quickly.**

· **You need a graphing calculator.** The calculators range in price but are very similar in function. The college officially suggests you get the TI-83 or TI-84 (TI stands for Texas Instruments). Most TI-83 instructions on my worksheets will also work for the TI-84. The TI-82, TI-85, and TI-86 are older models but will work fine. If you are not sure about your calculator, show it to me and we will see if it will work. Regardless of calculator type, I am willing to help you with it, but there are no guarantees. I am willing to help you with other non-TI brands as well. Please have your calculator with you when completing Class Notes or homework. You need to get your calculator as soon as possible. You may also want to consult the manual if it's a non-TI brand. **It is *not* acceptable to attempt this class without a graphing calculator.**

· If you do *not* have an actual calculator, it is okay to use an app on your phone or graphing calculator emulator program on your computer. You can borrow calculators in the Math Resource Center (CM 233, described later). If you do not have your own calculator, you must borrow a *non-phone* calculator for taking exams in Haskell (described later).

· We will use the calculator a lot in class. There are many instances in the Notes where your calculator is needed. I can help but it is your responsibility to learn to use your calculator. Learn it well and it can be of great use to you in this class. Please ask questions when you have issues. The Math Resource Center (CM 233, described later) is also a great place to go for help.

Evaluation/Point Breakdown:

MyStatLab (MSL) Homework Assignments	20% of total
Average of Four Exam Grades (paper-and-pencil)	80% of total

· The grade scale is A – 90%, B – 80%, C – 70%, D – 60%. Your grade information will be available through MyStatLab (MSL). Your overall grade shown in MSL will be accurate if you keep up with the assignments. **Grades are *not* shown in Blackboard.**

· It is your responsibility to print out Class Notes and Worksheets from the Website. When this is possible, the item will be underlined. Click on it to open it, and then print it. Printers are available in select computer labs around campus. Alternatively, if you visit my office, I will provide you with copies of the Notes I have. Use the extensive videos and other resources available on MyStatLab (MSL) and www.stlmath.com.

· You will see worksheets mentioned in the Class Notes. They are available on www.stlmath.com under Assorted Handouts and Tutorials on the Math 235 page. They are carefully designed to help you tackle hard concepts but will *not* be collected. You should work hard on all worksheets and assignments and ask questions when you have them. This class is difficult; do not underestimate it.

· We will have four paper-and-pencil exams. The exam component of your grade will be the average of these scores. You are required to take all exams. **You are allowed to use one sheet of notes (notebook-sized, front and back) on the exams. You must come to campus for exams as described later (Haskell Hall).**

· The breakdown of book material on each exam and tentative dates are below. This may change slightly.

Exam	Sections covered	Tentative Dates **
1	Chapters 1-3, 4.1-4.4	Mon., Sep. 29 – Wed., Oct. 1
2	5.1–5.5, 6.1, 6.2, 7.1-7.3	Mon., Oct. 27 – Wed., Oct. 29
3	8.1, 8.2, 9.1, 9.2, 10.1–10.3	Mon., Nov. 17 – Wed., Nov. 19
4	11.1-11.3, 12.1, 12.2, 13.1, 13.2	Wed., Dec. 17 – Thurs., Dec. 18 (Dec. 18 is the last day of the semester.)

** I will adjust these dates as you need. Contact me please.

· We have a lot to cover and we have little time. These are strict deadlines. However, if you happen to miss an exam because of an emergency, I can arrange for a makeup. However, only one makeup will be allowed. It is mandatory that you go to Haskell (or an alternative location) to take them. You will only have one attempt for each exam so be sure you are ready.

· You will take exams in the **Haskell Testing Center** which is located in **Haskell Hall (HK) B-25**. (It is located in the basement of Haskell Hall.) The **Haskell Testing Center's information is found at www.lc.edu/testing**; read this information carefully. **You may need to make an appointment each time although there are limited walk-in hours. Their phone number is 468-5232; their email address is testingcenter@lc.edu.** You must show a **photo ID** to take your exam. Make sure you take your *non-phone calculator*. You will *not* be allowed to use your own phone or computer. If you would prefer to make up your exam in Edwardsville, Jerseyville, or Carlinville, you will see the information for those alternative locations on their Website. You do *not* need my permission to use one of these alternative testing centers.

· The homework due dates are usually set for the Monday after the week you should be working on each section (technically, they are due at midnight of the due date). **You absolutely should be doing homework every other day or more frequently.** Due dates are listed for the Homework assignments in MSL (also, on next page here). All MSL homework assignments are available after the "due date". However, a 50% deduction will apply for all problems done after the due date. You only want to take advantage of this occasionally to maintain a good grade but that leeway is there is case you fall behind. **There is a strict deadline for late MML work; it is to all be done by the midnight before exam day.** There are no opening dates for homework, so you can try any homework as early as you want. This class is extremely full and homework should be done nearly every day to keep up.

Schedule for Homework and Exams		
MSL Assignments to be Completed * & Topics		**MSL Due Dates**
* There will be a separate MSL assignment for each section for chapters 4 through 14. Chapters 1-3 are condensed into one section of Notes and one MSL assignment each.		
Chapter O (Orientation) and Chapter 1		Tuesday, Sep. 2
Chapter 2		Monday, Sep. 15
Chapter 3, Section 4.1		Monday, Sep. 22
Sections 4.2 - 4.4 (and any late work)**		Sunday, Sep. 28
Exam 1	**Chapters 1-3, 4.1-4.4**	Mon., Sep. 29 – Wed., Oct. 1
(Keep up the good work!)		
Section 5.1		Monday, Oct. 6
Sections 5.2, 5.3		Monday, Oct. 13
Sections 5.4, 5.5, 6.1, 6.2		Monday, Oct. 20
Sections 7.1-7.3 (and any late work)**		Sunday, Oct. 26
(You're doing awesome! Email me for help.)		
Exam 2	**5.1–5.5, 6.1, 6.2, 7.1-7.3**	Mon., Oct. 27 – Wed., Oct. 29
Section 8.1		Monday, Nov. 3
Sections 8.2, 9.1, 9.2		Monday, Nov. 10
Sections 10.1-10.3 (and any late work)**		Sunday, Nov. 16
Exam 3	**8.1, 8.2, 9.1, 9.2, 10.1–10.3**	Mon., Nov. 17 – Wed., Nov. 19
(Almost there! Keep it up.)		
Section 11.1		Monday, Nov. 24
Section 11.2		Monday, Dec. 1
Sections 11.3, 12.1, 12.2		Monday, Dec. 8
Section 13.1		Monday, Dec. 15
Section 13.2 (and any late work)**		Tuesday, Dec. 16
Exam 4	**11.1-11.3, 12.1, 12.2, 13.1, 13.2**	Wed., Dec. 17 – Thurs., Dec. 18 (Dec. 18 is the last day of the semester.)

** Late work from each unit is due by midnight the day before the exam is available.

· Homework will take some time to complete, so make sure you give yourself plenty of time. **Keep in mind you do *not* need to do an assignment in one shot. You can start it one day and finish it another. In fact, you can go back and redo problems you missed to get full credit.** The MyStatLab (MSL) Website offers tons of help on the problems including the **Ask My Instructor** button, which lets you email me a short message along with the exact problem you are working on. Use this to ask specific questions about a problem.

· MyStatLab (MSL) has provided videos that you can watch through the Video & Resource Library (menu item). You may find they fill in holes left by the Class Notes. However, they are *not* mandatory and do *not* count toward your grade. The Class Notes focus on the material in the homework. You definitely want to complete the Class Notes on www.stlmath.com before you attempt the MSL homework. Be sure to email me questions. I have posted pre-recorded videos from my Math 145 class (which covers some of the same material) and completed versions of the Math 235 Notes (for those sections for which I do not have videos). You should always attempt to complete the Notes on your own before accessing the completed versions.

· **Keep in mind that the "Overall grade" in the MSL Gradebook does *not* include assignments that you have *not* started. The grade will look considerably higher than what you are actually earning if you have zeros on assignments.** At the end of the semester, when I figure your course grade, your grade may drop significantly when it figures those zeros into your score. Do *not* let a high overall score (or worse, a low C) in MSL fool you into not working hard to the end. To correct for this inaccuracy, **there are strict deadlines for late MML work; all MML work for a chapter must be done by the midnight before exam day.**

· **The final date of submission for MSL homework is Tuesday, December 16.** You will *not* be able to change your MSL grade after that date. The MSL site can be bogged down at the end of the semester which makes doing homework the last week of class very frustrating. Do *not* wait 'til the last minute to do it.

Attendance and makeup policies:

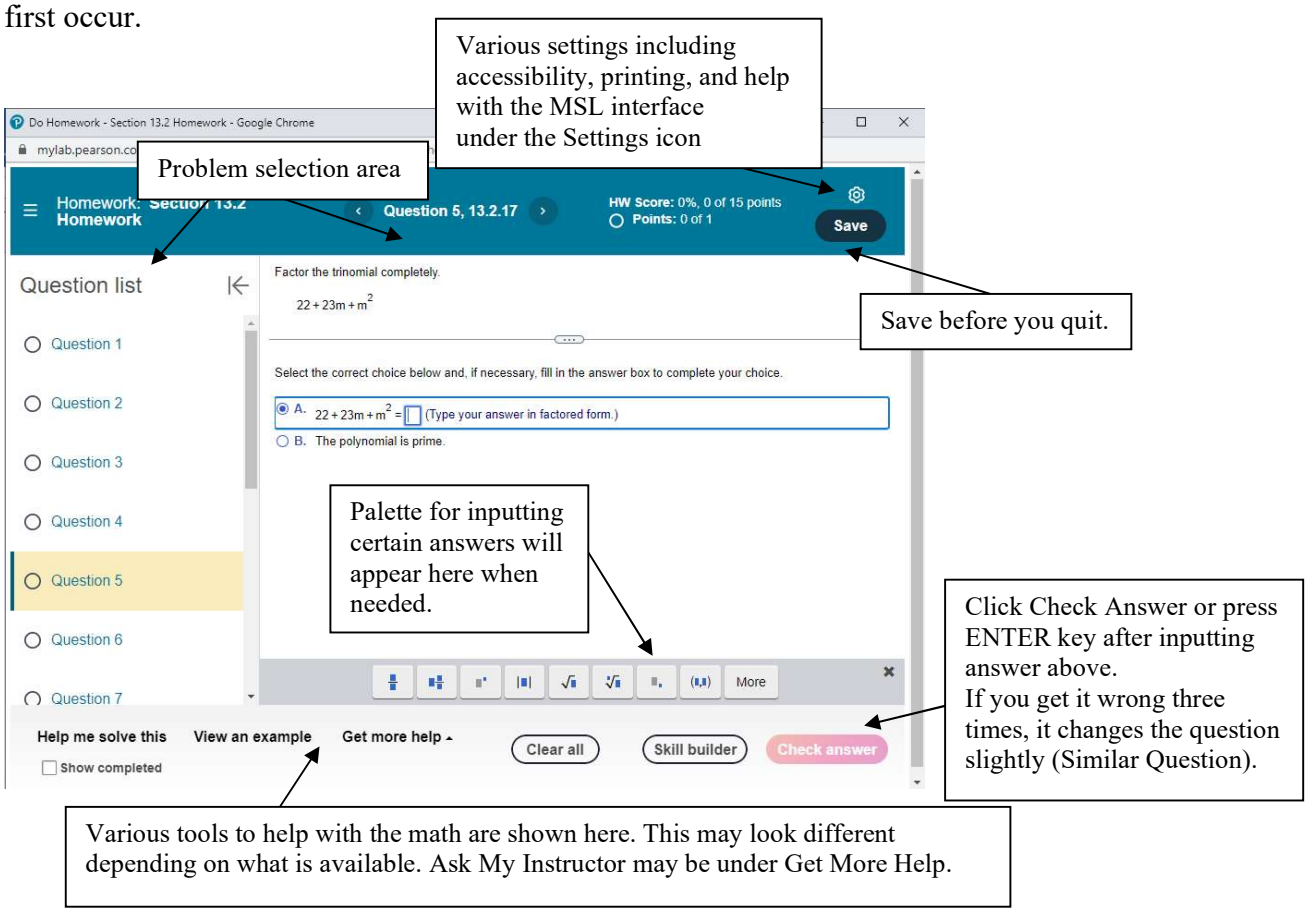
· We are *not* holding in-person classes as this is an online class. It is your responsibility to complete Class Notes provided on www.stlmath.com and then complete MSL homework assignments, coming into campus to take paper-and-pencil exams. Any given week, you should maintain a schedule so that you are studying the sections that are due the upcoming Monday. A workable (but full) schedule is given earlier. Work the MSL homework as you complete sections of Class Notes so the material is fresh in your mind. It is an atrocious idea to wait 'til the due date to work the homework.

· If you miss an exam, contact me and we will make arrangements for you to make it up. You will make appointments with Haskell as described earlier but I will need to adjust the settings in MSL first. The last exam *cannot* be missed as the last day it is available is the last day of the semester. You will be allowed to make up only one exam.

MyStatLab (Quick Tutorial):
Below you will find a sample homework assignment in MSL. You can select any problem in the set to work on. This is particularly useful when you are returning to a set to correct mistakes. Notice a check mark or an X indicates if you got it right or wrong (not shown on this example). Once you click in the answer space, an appropriate palette that allows you to enter fractions, radicals, exponents, etc. exactly as you would write them will appear. You are often expected to use the palette to enter your answers in the correct form. On the lower left-hand side, you will notice help topics that includes videos, completed examples, and other resources at your disposal. There is help available (and an option to print) under the Settings icon in the upper right if you have trouble with the interface as opposed to the math.

Rounding errors are possible if you do too much rounding early in a problem so do *not* round your answer until the very end. Be careful to follow the instructions on how to enter your answers. Specifically, they will denote how to round and what form (fraction versus decimal, for example) your answer should be in. The instructions may vary from problem to problem. After you complete a problem, you must click "Check Answer". Make sure you "Save" your work (top) before exiting.

Use the Ask My Instructor option (possibly under Get More Help on bottom) to report problems with grading or to ask specific questions about a problem. It is easy to get frustrated with an online tool like MSL. Be sure to reach out with questions when they first occur.



Miscellaneous details:
· I want you to feel comfortable with me and the class. If there is anything I can do to help you, please tell me. If I use the wrong pronoun (her versus him) in addressing you or mispronounce your name, please forgive me and tell me what is correct. If you are ever made to feel uncomfortable in the class or at school in general, please bring the issue to my attention.

· The handouts on the Website are in PDF format; you will need the Adobe Acrobat Reader to read these. The Reader is available online at www.adobe.com -- just follow the links to download the latest Acrobat Reader. It is free of charge. There are optional worksheets listed at the bottom of the "Assorted Handouts and Tutorials" portion of the Website. Use them for extra practice.

· If you need to contact me, phone or email me. I may send emails to either your LC email account or the email account you give to MSL. If you do *not* use your LC email account frequently, please get in the habit or set it up to forward your mail to an account you do use. Email is inherently insecure; meaning if someone wanted to, they could read our emails. Be aware of this when you and I correspond.

· The **Math Resource Center (MRC, located in CM 233)** is available for in-person and online tutoring Monday through Friday 8:00 am – 4:30 pm. Contact bkribs@lc.edu or call 618-468-4118 to set that up. Their Website is linked from my Website where you can find other information.

· The last day for a full refund is September 5. The last day to withdraw with a grade of W is November 21 (to avoid a D or F). The last day of the semester is Thursday, December 18.

Accommodations
If you need an accommodation based on the impact of a disability, inform your instructor as soon as possible. You can request accommodations at www.lc.edu/access or contact the Center of Access and Accommodations at (618) 468-4128 or access@lc.edu. Center for Access and Accommodations is located in HK B07.

Counseling
Counseling is by appointment and on an emergency walk-in basis. Visits are confidential, free of charge, and include counseling for crisis intervention, brief therapy, academic issues, test anxiety, community resources, and referrals. Contacts: Brooke Frank (HY 211): bfrank@lc.edu, (618) 468-4130. Terri Austin (HY 212): taaustin@lc.edu, (618) 468-4125.

Veteran Services
We support our veteran and service member students and their families by providing a Veteran Services Department and a Veterans' Resource Center. This department supplements the assistance provided by Enrollment, Advising and Financial Aid. You can confidentially discuss academic or personal issues. Referrals will be made as needed to campus and/or community assistance. Contact Sarah Albright (RE 1200) at 618-468-5312 or salbright@lc.edu.

Title IX Sexual Assault

Lewis and Clark Community College is committed to maintaining a safe and healthy educational and employment environment that is free from sex discrimination, which includes discrimination and harassment based on sex, sex stereotypes, sex characteristics, pregnancy and related conditions, sexual orientation, and gender-related identity and expression. The College also prohibits all forms of sex-based misconduct, including but not limited to sexual violence, domestic violence, dating violence, and stalking. Faculty are legally required to report incidents of sex discrimination or misconduct brought to their attention through any sources and thus cannot guarantee confidentiality. To file a complaint, contact Sean Hill, Title IX Coordinator, at shill@lc.edu or 618-468-6000; or Mya Lawrence, Deputy Title IX Coordinator, at mylawrence@lc.edu or 618-468-6030. Students who wish to confidentially report an incident of sex discrimination may contact Terri Austin, Counselor, at taaustin@lc.edu or 618-468-4125; or Brooke Frank, Case Coordinator, at bfrank@lc.edu or 618-468-4130. Students can also leave an anonymous message on the college's toll-free number for reporting sexual violence at 855-RSV-4RSV (855-778-4778) or send an email to 4rsv@lc.edu. Please visit https://www.lc.edu/4RSV for more information.

Academic Continuity Statement (Please fill in your contact information)

In the event of an unexpected campus closure or delayed start, course requirements, deadlines and grading percentages are subject to change when necessitated by revised course delivery, semester calendar or other circumstances. Information about changes in this course can be obtained on the Blackboard course homepage or by contacting my email address: soleary@lc.edu or office phone 618-468-4844. If the course is not able to meet face-to-face, students should immediately log onto L&C Blackboard, https://blackboard.lc.edu, and read any announcements and/or alternative assignments. Students are also encouraged to continue the readings and other assignments as outlined on this syllabus or subsequent syllabi.

Virtual Meeting Policy

By participating in our live events, you are acknowledging awareness that, depending on your involvement, your name, voice, comments, and likeness may be recorded and shared with other L&C students and faculty. If you are uncomfortable participating with these acknowledgements, please contact your course instructor for alternate arrangements.

Diversity Statement

At Lewis and Clark Community College, we are seriously committed to supporting diversity and inclusion in our classrooms and community. We proactively strive to construct a safe and inclusive environment by respecting each other's dignity and privacy. We treat one another fairly and honor each member's experiences, beliefs, perspectives, abilities, and backgrounds, regardless of race, religion, language, immigration status, sexual orientation, gender identification, ability status, socio-economic status, national identity, or any other identity markers. Bullying, hateful ideas, violent language, belittling, racial slurs, and other disrespectful or "othering" language or behavior will not be tolerated. We behave and communicate respectfully toward one another, both directly and indirectly, both inside and outside the classroom. A diverse and inclusive campus is our strength, and we want all who are part of our campus community to feel safe and respected.

If you ever have any concerns about the classroom climate, please reach out to Mya Lawrence, Director of Diversity, Equity, and Inclusive Excellence, NU L134, 618-468-6030, mylawrence@lc.edu

L&C Policy on Academic Honesty: Cheating.

Intentionally using or attempting to use unauthorized materials, information or study aids; use of any unauthorized assistance, resources, materials or electronic/cellular devices with or without photographic capability in taking quizzes, tests or examinations and the acquisition, without permission, of a test or other academic material belonging to Lewis & Clark Community College, to any department, or to any staff.

Plagiarism

Plagiarism at LCCC will not be tolerated. Plagiarism includes the reproduction of ideas, words or statements of another person as ones' own without acknowledgement or use of an agency engaged in the selling of term papers or other academic materials. If instructor has reason to believe students are in violation of this policy, students will be notified and appropriate action will be taken.

LCCC Plagiarism statement

Assignments that have been copied from another student or another source will not be scored. "Academic dishonesty including, but not limited to, cheating, plagiarism, and forgery, violates the STUDENT CONDUCT CODE and will lead to disciplinary action up to and including expulsion". The following website will give you in-depth information on the definition of plagiarism and more: http://www.plagiarism.org/article/what-is-plagiarism Please visit this site if you need clarification.

Unauthorized Collaboration

Unauthorized collaboration among students will not be tolerated. Unauthorized collaboration is defined as intentionally sharing or working together in an academic exercise when such actions are not approved by the course instructor. Academic exercises include but are not limited to all face-to-face and/or online classroom assignments, activities, exams, quizzes, worksheets, online discussion questions, term papers, case studies, projects, research, or any other requirement assigned by the instructor for which students receive individual grades. If the instructor has reason to believe students share or work together collaboratively on such academic exercises, the student(s) will be notified and at the minimum, receive a zero on the assignment.

Facilitation of Academic Dishonesty

Permitting or attempting to help another to violate the academic honor code; Alteration or sabotage of another student's work, such as tampering with or modifying any online or written assignments including but not limited to quizzes, exams, worksheets, term papers, case studies, projects, research, discussion board entries, etc. If the instructor has reason to believe students facilitate academic dishonesty, the student(s) will be notified, and appropriate action will be taken.

· **Blackboard:** I use Blackboard very little. You will use it to register for MSL at the beginning of the semester. You will spend most of your time outside of class in MSL or www.stlmath.com. Do *not* use Messages in Blackboard; please email me at soleary@lc.edu instead.

For Your Information: Exam Rules for Syllabi (based on new state standards)
To ensure the integrity of academic work and support compliance with accreditation standards, a minimum of 60% of all graded assessments in each course must be proctored. Proctoring may be conducted either:
- Online using an approved remote proctoring system that verifies identity and monitors student activity during the assessment, or
- In-person at the institution's main campus testing center or a designated Community Education Center (CEC) location.
- In-person in a designated classroom monitored by the instructor or approved proctor by means of visual observation and/or computer monitoring software.
This policy applies to all credit-bearing courses offered by the institution, regardless of delivery format (online, hybrid, or in-person). Graded assessments include, but are not limited to exams, quizzes, worksheets, and research-based assignments or other evaluative tasks that contribute to the course grade.

Math Department AI Policy Statement
The responsible use of Artificial Intelligence (AI) tools is permitted in mathematics courses for the purpose of learning and concept development. However, the use of AI tools to complete graded assignments intended to demonstrate a student's individual understanding and mastery of material is strictly prohibited.

Permitted Use of AI Tools
AI tools such as ChatGPT, Wolfram Alpha, Microsoft Math Solver, PhotoMath, and similar platforms may be used to:
- Explore and reinforce mathematical concepts
- Practice problem-solving strategies
- Receive guided explanations for learning purposes

These tools are encouraged as educational resources, provided their use supports the student's learning rather than replaces their own reasoning.

Prohibited Use of AI Tools
Students may not use AI tools to generate answers or complete any graded work that is intended to reflect their own comprehension and problem-solving abilities. This includes, but is not limited to:
- Homework assignments
- Quizzes
- Tests or exams
- Take-home assessments
- Projects involving mathematical calculations or proofs

Academic Integrity Statement
Use of AI in violation of this policy is considered unauthorized assistance and constitutes a breach of LC's Academic Honesty Policy and Student Code of Conduct. Consequences of such violations include disciplinary action up to and including expulsion from the college.

Rationale
The purpose of mathematics instruction is to develop critical thinking, problem-solving skills, and conceptual understanding. While AI tools offer significant educational benefits, unapproved reliance on them undermines academic integrity and devalues personal learning. This policy ensures fairness, upholds the integrity of academic credentials, and aligns with institutional standards for ethical academic behavior.

· **What Students can expect from Online Instructors**
Students can expect their instructor to:
1. respond to questions/problems within 48 hours.
2. log into the course 5 out of 7 days a week; and
3. provide continued grade statuses throughout the semester using either a calculated column in the grade book (in MyStatLab) or a report sent through email.

· **Course Description and Topics:**
Examines basic concepts of statistical analysis used in decision making in business, social and life sciences, including probability and how uncertainty is dealt with in real life. Includes assembly and summarization of data, measures of central tendency and variability, probability theory, discrete and continuous probability distributions, estimation, one- and two-sample hypothesis testing for means and proportions, correlation regression analysis, multiple regression, chi-square, and one-way analysis of variance. Integrates graphing calculator technology and statistical computer software in the learning process.

1.1 Introduction to the Practice of Statistics
1.2 Observational Studies versus Designed Experiments
1.3 Simple Random Sampling
1.4 Other Effective Sampling Methods
1.5 Bias in Sampling
1.6 The Design of Experiments
2.1 Organizing Qualitative Data
2.2 Organizing Quantitative Data: The Popular Displays
2.3 Additional Displays of Quantitative Data
2.4 Graphical Misrepresentations of Data
3.1 Measures of Central Tendency
3.2 Measures of Dispersion
3.4 Measures of Position and Outliers
3.5 The Five-Number Summary and Boxplots
4.1 Scatter Diagrams and Correlation
4.2 Least-Squares Regression
4.3 Diagnostics on the Least-Squares Regression Line
4.4 Contingency Tables and Association
5.1 Probability Rules
5.2 The Addition Rule and Complements

5.3 Independence and the Multiplication Rule
5.4 Conditional Probability and the General Multiplication Rule
5.5 Counting Techniques
6.1 Discrete Random Variables
6.2 The Binomial Probability Distribution
7.1 Properties of the Normal Distribution
7.2 Applications of the Normal Distribution
7.3 Assessing Normality
8.1 Distribution of the Sample Mean
8.2 Distribution of the Sample Proportion
9.1 Estimating a Population Proportion
9.2 Estimating a Population Mean
10.1 The Language of Hypothesis Testing
10.2 Hypothesis Tests for a Population Proportion
10.3 Hypothesis Tests for a Population Mean
11.1 Inference about Two Population Proportions
11.2 Inference about Two Means: Dependent Samples
11.3 Inference about Two Means: Independent Samples
12.1 Goodness of Fit Test
12.2 Tests for Independence and the Homogeneity of Proportions
13.1 Comparing Three or More Means (Analysis of Variance)
13.2 Post Hoc Tests on One-Way Analysis of Variance