






Recent Announcements

	<u>Calculus Review</u> https://canvas.txstate.edu/courses/1469146/discussion_topics/6414812 I will discuss the flagged calculus questions from Web Assign in class tomorrow...	Posted on: Aug 31, 2020 at 12:08pm
	<u>Covid-19 Histogram reworked</u> https://canvas.txstate.edu/courses/1469146/discussion_topics/6388566 I've reworked the last histogram, to clarify the details. I hope this h...	Posted on: Aug 27, 2020 at 3:10pm
	<u>Calculus and Algebra Review</u> https://canvas.txstate.edu/courses/1469146/discussion_topics/6364546 Please check out the folder for extra notes, problems and solutions to pr...	Posted on: Aug 25, 2020 at 12:19pm
	<u>Textbook Cover and Formula Sheet</u> https://canvas.txstate.edu/courses/1469146/discussion_topics/6363314 As requested, I've just posted the following under the Files section: 1. A pictur...	Posted on: Aug 25, 2020 at 10:59am
	<u>Web Assign Office Hours</u> https://canvas.txstate.edu/courses/1469146/discussion_topics/6356122 Dear students, We will be using Web Assign this semester for online homework. ...	2 Posted on: Aug 24, 2020 at 4:42pm

INTRO PROB & STATS

Welcome to Math 3305 Sections 1&2 ~ Introduction to Probability and Statistics

Please Note: This class is fully online this semester. We will be using Canvas, Zoom and Web Assign. I will try to make this class as much like a traditional face-to-face class as is possible during this trying

time.

Please send emails to ast78@txstate.edu, [_\(mailto:ast78@txstate.edu\)](mailto:ast78@txstate.edu) not through Canvas, as it is less reliable.

Section #1 9:30 am Zoom Link shortcut~

<https://txstate.zoom.us/j/94200689686?pwd=RHdFZW1hZEIXY0xRbElwaDdZcUpwdz09>

Meeting ID: 942 0068 9686

Passcode: 330501

Section #2 12:30 pm Zoom link shortcut~

<https://txstate.zoom.us/j/99396978956?pwd=U2VQS3owV0VyRm80Z3gxZ1NKM1hpUT09>

Meeting ID: 993 9697 8956

Passcode: 330502

Syllabus

MATH 3305 (Sections 1 & 2) Intro to Probability and Statistics (Fall 2020)

MEETING TIMES (This course meets exclusively online via Canvas and Zoom):

Section 1: TR 9:30-10:50 and Section 2: TR 12:30-1:50

INSTRUCTOR: Dr. Abby Train **EMAIL:** ast78@txstate.edu

OFFICE HOURS: MW: 10:00 am -12:00 pm, and by appointment.

TOPICS: This is a calculus-based probability and statistics course. Topics include probability, conditional probability, discrete and continuous random variables, univariate and bivariate distributions of random variables, and mathematical expectations. Moment-generating functions will also be covered, if possible.

GOAL AND OBJECTIVES: The goal of this course is to introduce the concepts and properties of probability,

random variables and their probability distributions and help students develop skills to apply them to solve

practical problems. The goal will be achieved by meeting the following objectives. After successful completion of the course, students will be able to:

- ☐ Determine sample spaces of random experiments and solve probabilities using permutation or combination techniques and the complement, addition, and multiplication rules.
- ☐ Understand and determine independent events and mutually exclusive events.
- ☐ Distinguish discrete and continuous random variables and their probability distributions, compute probabilities using the distributional functions, and derive the mathematical expectations of an arbitrary function of random variable(s).
- ☐ Identify, formulate, and solve real-world problems using appropriate common discrete and continuous probability models (e.g., binomial, geometric, Poisson, uniform, and normal distributions).
- ☐ Handle joint distributions when two or more random variables are involved.

PREREQUISITES: MATH 2472 (Calculus II) with a grade of C or above. You are expected to be able to differentiate and integrate differentiable functions.

REQUIRED TEXT: Mathematical Statistics with Applications, 7th ed., by D. Wackerly, *ISBN-13:978-0-495-11081-1* . Most sections in chapters 1-5 will be covered.

Canvas: Students are expected to check Canvas frequently for announcements, assignments, quizzes, solutions, etc., which will be updated regularly.

CALCULATOR: You will be allowed to use a calculator on exams, but you are not allowed to use wireless devices such as cell phones or web-enabled calculators.

Zoom: (Link to it on Canvas)

Section #1 Link

Please download and import the following iCalendar (.ics) files to your calendar system.

Weekly: <https://txstate.zoom.us/meeting/tJAvd-mupjlsEtJbGap7ymMMdwxwcMOVs7j5/ics?icsToken=98tyKuCsRdsqHNyctHGBRowlAligc-7xiFhdj7d3njjkE3dKby7bMvVaJbFSP-7D>

Join Zoom Meeting

<https://txstate.zoom.us/j/94200689686?pwd=RHdFZW1hZEIXY0xRbElwaDdZcUpwdz09>

Meeting ID: 942 0068 9686

Passcode: 330501

Section #2 Link

Please download and import the following iCalendar (.ics) files to your calendar system.

Weekly: https://txstate.zoom.us/meeting/tJ0ufu-hqTMjH9liMofk7gwkl5IIN1uUdypL/ics?icsToken=98tyKuChrTIsE9OduRyBRox5A4r4M_PwtlxEgvp0ITLqBSsEZRT9OrdrG5wuBe3U

Join Zoom Meeting

<https://txstate.zoom.us/j/99396978956?pwd=U2VQS3owV0VyRm80Z3gxZ1NKM1hpUT09>

Meeting ID: 993 9697 8956

Passcode: 330502

Office Hours Link

To setup an office hour appointment, first go to the Canvas chat. Once the appointment is set, follow the link below to the Office Hour Zoom session.

Time: Aug 24, 2020 12:00 PM Central Time (US and Canada)

Every week on Mon and Wed, until Dec 7, 2020, 16 occurrence(s)

Please download and import the following iCalendar (.ics) files to your calendar system.

Weekly: https://txstate.zoom.us/meeting/tJlsceugrjMuG9Mo3a-Bw56nwyFjF7r9gY9S/ics?icsToken=98tyKuCurz0oEtSdtBiARowABY_oa_zziFxbjfpwk0zkTgJEN1X4lftkOJQoAoHX

Join Zoom Meeting

<https://txstate.zoom.us/j/96162808417?pwd=WjdjOVJhNjhBTk9TTjVvTHI1K3JoQT09>

Meeting ID: 961 6280 8417

Passcode: 494194

HOMEWORK: Homework will be assigned regularly in Web Assign. A Web Assign access code is **required**. Web Assign will be accessed through Canvas. The homework will serve as preparation for exams, with the following caveats: homework assignments will be setup to allow for unlimited tries; you may continue to work on the assignments past the due dates, for a 50% penalty. Please note: due to this homework environment setup, merely receiving a high grade on the assignments is not sufficient preparation for exams, where only one attempt per question will be allowed and all video and web assistance will be disallowed.

EXAMS: Three mid-term exams will be given during lecture time along with a comprehensive final exam. All

exams **MUST** be taken as scheduled unless evidence of a legitimate, unavoidable problem is presented to

your instructor at least 24 hours in advance. You may use a hand-written “cheat sheet” on all exams, that will need to be scanned and uploaded to Canvas after your exam is completed.

QUIZZES: Quizzes will be given periodically in Canvas. These assignments will need to be written out by hand, scanned and submitted for grading in Canvas. You must use scanning software (many free

apps are available for scanning) and not your phone's camera, as the Canvas grading tool can not adequately work with photos.

ATTENDANCE AND CLASS PARTICIPATION: (1) Class attendance is expected and participation during class

is encouraged. Any absences should be discussed with the instructor in advance. (2) Students are encouraged (but not required) to form a study/support group with 2 to 4 students to help each other.

Students may discuss with group members or others, but should finish the homework independently, and must complete quizzes and exams independently.

EVALUATION: Students will be evaluated based on their performance on exams, quizzes, and homework

as illustrated below.

WebAssign Homework -15%

Quizzes (to be submitted via Canvas) -20%

Three Mid-Term Exams, Each 15% for a total of 45%

Final exam *December 10 (Thurs) anytime from 8 am – 11:59 pm -20%

Grading Scale for Final Grades:

A: total score >90% | B: total score >80% | C: total score >70% | D: total score >60% | F: total score ≤60%

DROP DEADLINES: Last day to receive an automatic "W" grade is October 26, 2020.

(Very) Tentative Schedule:

Week 1, week of 8/24: Lecture 0 over Syllabus and Calculus Review, Lecture 1 over Chapter 1

Week 2, week of 8/31: Lecture 2 over Chapter 1 and Lecture 3 over Chapter 2

Week 3, week of 9/07: Lecture 4 over Chapter 2 and Lecture 5 over Chapter 2

Week 4, week of 9/14: Lecture 6 over Chapter 2 and Lecture 7 over Chapter 2

Week 5, week of 9/21: Lecture 8 over Chapter 2 and Review of Chapters 1 & 2

Week 6, week of 9/28: **Exam #1** over Chapters 1 & 2 and Lecture 9 over Chapter 3: 3.1-3.3

Week 7, week of 10/05: Lecture 10 over Chapter 3.1-3.3 and Lecture 11 over Chapter 3.4

Week 8, week of 10/12: Lecture 12 over Chapter 3.5 and Lecture 13 over Chapter 3.8

Week 9, week of 10/19: Lectures 14 & 15 over Chapter 4: 4.1-4.3

Week 10, week of 10/26: "W" day 10/26, Lecture 16 over 4.4 and Lecture 17 over 4.5

Week 11, week of 11/02: Review Chapters 3 & 4 and **Exam #2** over Chapters 3 & 4

Week 12, week of 11/09: Lectures 18 & 19: Chapter 5

Week 13, week of 11/16: Lectures 20 & 21: Chapter 5

Week 14, week of 11/23: Lecture 22: Chapter 5 and Thanksgiving holiday beginning 11/25

Week 15, week of 11/30: Review Chapter 5 and **Exam #3** over Chapter 5. End of classes

Final Exam: Thursday, December 10, 2020 anytime from 8:00 am – 11:59 pm. This may be different from the assigned final exam time listed on the schedule. Please let me know if this causes any issues for you ASAP.

HONOR CODE: All students are required to abide by the Texas State University honor code. The pledge for

students states: Students at our University recognize that, to insure honest conduct, more is needed than an expectation of academic honesty, and we therefore adopt the practice of following pledge of honesty to the work we submit for evaluation: I pledge to uphold the principles of honesty and responsibility at our University. The complete honor code may be found at <http://www.txstate.edu/efferentiateandintegratefunctions.ective/upps/upps-07-10-01.html> under attachment I.

ACADEMIC DISHONESTY: Academic honesty is fundamental to the activities and principles of a university.

Any advantage not given to all students is dishonest whether or not the advantage is successful.

The University regards academic dishonesty as an extremely serious matter, with serious consequences that range from probation to expulsion. If it is determined that a student has cheated on an exam, he or she will be given 0 on the exam or a failing grade in the course regardless of the student's performance beyond the act of academic dishonesty.





STUDENTS WITH SPECIAL NEEDS: Students with special needs (as documented by the office of Disability

Services) should identify themselves in the first two weeks of this semester and let the instructor know so

that appropriate accommodations can be arranged.

DISCLAIMER: *The instructor reserves the rights to modify the above information as necessary.*

Course Summary:

Date	Details	
Tue Sep 1, 2020	 Chapter 1 Quiz (https://canvas.txstate.edu/courses/1469146/assignments/18021772)	due by 11:59pm
	 Q1 Lec0 (https://canvas.txstate.edu/courses/1469146/assignments/17744922)	due by 11:59pm
Thu Sep 3, 2020	 Quiz 2.1 thru 2.5 (https://canvas.txstate.edu/courses/1469146/assignments/18109146)	due by 11:59pm
Tue Sep 8, 2020	 Quiz 2.6 (https://canvas.txstate.edu/courses/1469146/assignments/18225746)	due by 11:59pm