Course Calendar

MA 16100 - FALL 2022

Week	Day	Class Activities	Outside of Class Activities
1	MON 8/22	**Lesson 0** What should you know about this course?	**Reading** Sec 1.1: Review of Functions Sec 1.2: Representing Functions
	TUE 8/23	**Recitation** No Quiz	
	WED 8/24	**Lesson 1** How do you represent growth and decay?	**Reading** Sec 1.3: Inverse, Exponential, and Logarithmic Functions
	THU 8/25	**Recitation** Quiz 0 (Syllabus Quiz)	**Homework** HW0 (Lesson 0) HW1 (Lesson 1)
	FRI 8/26	**Lesson 2** What are the points on the unit circle?	**Reading** Sec 1.4: Trigonometric Functions and Their Inverses
2	MON 8/29	**Lesson 3** What happens as you get infinitesimally close?	**Reading** Sec 2.1: The Idea of Limits Sec 2.2: Definition of Limits
	TUE 8/30	**Recitation** Quiz 1 (Lessons 0-1)	**Homework** HW2 (Lesson 2) HW3 (Lesson 3)
	WED 8/31	**Lesson 4** How do you compute a limit?	**Reading** Sec 2.3: Techniques for Computing Limits
	THU 9/1	**Recitation** Quiz 2 (Lessons 2-3)	**Homework** HW4 (Lesson 4)
	FRI 9/2	**Lesson 5** What happens if a limit approaches infinity?	**Reading** Sec 2.4: Infinite Limits *Last day to cancel without it appearing on your record

3	MON 9/5	**Labor Day Holiday** No Class	
	TUE 9/6	**Recitation** Quiz 3 (Lesson 4)	**Homework** HW5 (Lesson 5)
	WED 9/7	**Lesson 6** What happens in the limit as x goes to infinity?	**Reading** Sec 2.5: Limits at Infinity
	THU 9/8	**Recitation** Quiz 4 (Lesson 5)	**Homework** HW6 (Lesson 6)
	FRI 9/9	**Lesson 7** What does it mean for a function to be continuous?	**Reading** Sec 2.6: Continuity
4	MON 9/12	**Lesson 8** How can we measure the steepness of a curve?	**Reading** Sec 3.1: introducing the Derivative
	TUE 9/13	**Recitation** Quiz 5 (Lessons 6)	**Homework** HW7 (Lesson 7) HW8 (Lesson 8)
	WED 9/14	**Lesson 9** The derivative is also a function	**Reading** Sec 3.2: The Derivative as a Function
	THU 9/15	**Recitation** Quiz 6 (Lessons 7-8)	**Homework** HW9 (Lesson 9)
	FRI 9/16	**Lesson 10** How do you compute the derivative?	**Reading** Sec 3.3: Rules of Differentiation
5	MON 9/19	**Review** How to prepare for Exam 1?	*Last day to withdraw with a W with instructor and advisor signature
	TUE 9/20	**Recitation** Exam 1 Review (No Quiz)	**Exam 1** (covers Lessons 0-10) 6:30-7:30pm in ELLT
	WED 9/21	**Lesson 11** How do you compute the derivative of a product of functions?	**Reading** Sec 3.4: The Product and Quotient Rules
	THU 9/22	**Recitation** Quiz 7 (Lesson 9)	**Homework** HW10 (Lesson 10) HW11 (Lesson 11)
	FRI 9/23	**Lesson 12** How do you compute the derivative of a trigonometric function?	**Reading** Sec 3.5: Derivatives of Trigonometric Functions

6	MON 9/26	**Lesson 13** How do you compute the derivative of a composite function?	**Reading** Sec 3.6: Derivatives as Rates of Change Sec 3.7: Chain Rule
	TUE 9/27	**Recitation** Quiz 8 (Lessons 10-11)	**Homework** HW12 (Lesson 12) HW13 (Lesson 13)
	WED 9/28	**Lesson 14** More applications of the Chain Rule.	**Reading** Sec 3.7: Chain Rule
	THU 9/29	**Recitation** Quiz 9 (Lessons 12-13)	**Homework** HW14 (Lesson 14)
	FRI 9/30	**Lesson 15** How do you compute derivatives of implicit functions?	**Reading** Sec 3.8: Implicit Differentiation
7	MON 10/3	**Lesson 16** Why is e the base for the natural exponent?	**Reading** Sec 3.9: Derivatives of Logarithmic and Exponential Functions
	TUE 10/4	**Recitation** Quiz 10 (Lesson 14)	**Homework** HW15 (Lesson 15) HW16 (Lesson 16)
	WED 10/5	**Lesson 17** What is the derivative of arcsine?	**Reading** Sec 3.10: Derivatives of Inverse Trigonometric Functions
	THU 10/6	**Recitation** Quiz 11 (Lessons 15-16)	**Homework** HW17 (Lesson 17)
	FRI 10/7	**Lesson 18** How are rates of change related to each other?	**Reading** Sec 3.11: Related Rates
8	MON 10/10	**October Break** No Class	
	TUE 10/11	**October Break** No Class	
	WED 10/12	**Lesson 19** More examples of related rates	**Reading** Sec 3.11: Related Rates
	THU 10/13	**Recitation** Quiz 12 (Lesson 17)	**Homework** HW18 (Lesson 18) HW19 (Lesson 19)
	FRI 10/14	**Lesson 20** How can you find the maximum of a function using the derivative?	**Reading** Sec 4.1: Maxima and Minima
	SAT 10/15		**MyLab Math Scheduled Maintenance** (MLM will be down 1am-9am ET)

9	MON 10/17	**Review** How to prepare for Exam 2?	
	TUE 10/18	**Recitation** Exam 2 Review (No Quiz)	**Exam 2** (covers Lessons 11-20) 6:30-7:30pm in ELLT
	WED 10/19	**Lesson 21** What can the derivative tell us about a function?	**Reading** Sec 4.2: Mean Value Theorem Sec 4.3: What Derivatives Tell Us
	THU 10/20	**Recitation** Quiz 13 (Lessons 18-19)	**Homework** HW20 (Lesson 20) HW21 (Lesson 21)
	FRI 10/21	**Lesson 22** More things that derivatives tell us.	**Reading** Sec 4.3: What Derivatives Tell Us
10	MON 10/24	**Lesson 23** How can you graph a function using the derivative?	**Reading** Sec 4.4: Graphing Functions
	TUE 10/25	**Recitation** Quiz 14 (Lesson 20-21)	**Homework** HW22 (Lesson 22) HW23 (Lesson 23) *Last day to withdraw from a course
	WED 10/26	**Lesson 24** More techniques for graphing functions	**Reading** Sec 4.4: Graphing Functions
	THU 10/27	**Recitation** Quiz 15 (Lessons 22-23)	**Homework** HW24 (Lesson 24)
	FRI 10/28	**Lesson 25** How do you find an optimal solution using the derivative?	**Reading** Sec 4.5: Optimization Problems
11	MON 10/31	**Lesson 26** More techniques for solving optimization problems	**Reading** Sec 4.5: Optimization Problems
	TUE 11/1	**Recitation** Quiz 16 (Lesson 24)	**Homework** HW25 (Lesson 25) HW26 (Lesson 26)
	WED 11/2	**Lesson 27** How can you approximate the value of a function using the derivative?	**Reading** Sec 4.6: Linear Approximation and Differentials
	THU 11/3	**Recitation** Quiz 17 (Lessons 25-26)	**Homework** HW27 (Lesson 27)
	FRI 11/4	**Lesson 28** How can you evaluate indeterminate limits using the derivative?	**Reading** Sec 4.7: l'Hopital's Rule

12	MON 11/7	**Lesson 29** What is the inverse of a derivative?	**Reading** Sec 4.9: Antiderivatives
	TUE 11/8	**Recitation** Quiz 18 (Lesson 27)	**Homework** HW28 (Lesson 28) HW29 (Lesson 29)
	WED 11/9	**Lesson 30** How do you approximate the area under a curve?	**Reading** Sec 5.1: Approximating Areas Under Curves
	THU 11/10	**Recitation** Quiz 19 (Lessons 28-29)	**Homework** HW30 (Lesson 30)
	FRI 11/11	**Lesson 31** Computing the area under a curve exactly using definite integrals	**Reading** Sec 5.2: Definite Integrals
13	MON 11/14	**Review** How to prepare for Exam 3?	
	TUE 11/15	**Recitation** Exam 3 Review (No Quiz)	**Exam 3** (covers Lessons 20-30) 6:30-7:30pm in ELLT
	WED 11/16	**Lesson 32** What is the Fundamental Theorem of Calculus?	**Reading** Sec 5.3: Fundamental Theorem of Calculus
	THU 11/17	**Recitation** Quiz 20 (Lesson 30)	**Homework** HW31 (Lesson 31) HW32 (Lesson 32)
	FRI 11/18	**Lesson 33** How do you work with integrals?	**Reading** Sec 5.4: Working with Integrals Sec 5.5 Substitution Rule
14	MON 11/21	**No Class** (Class canceled due to Exam 1)	
	TUE 11/22	**No Class** (Class canceled due to Exam 2)	
	WED 11/23	**Thanksgiving Break** (No Class)	
	THU 11/24	**Thanksgiving Break** (No Class)	
	FRI 11/25	**Thanksgiving Break** (No Class)	
	SAT 11/26		**MyLab Math Scheduled Maintenance** (MLM will be down 1am-9am ET)

15	MON 11/28	**Lesson 34** How can you transform an integral into something easier to compute?	**Reading** Sec 5.5: Substitution Rule
	TUE 11/29	**Recitation** Quiz 21 (Lessons 31-32)	**Homework** HW33 (Lesson 33) HW34 (Lesson 34)
	WED 11/30	**Lesson 35** How can you model exponential growth?	**Reading** Sec 7.2: Exponential Models
	THU 12/1	**Recitation** Quiz 22 (Lessons 33-34)	**Homework** HW35 (Lesson 35)
	FRI 12/2	**Review** How to prepare for the Final Exam?	
16	MON 12/5	**Review** How to prepare for the Final Exam?	**Quiet Week -** The University mandates that there are no homework, quizzes, or exams this week
	TUE 12/6	**Recitation** Final Exam Review (No Quiz)	
	WED 12/7	**Review** How to prepare for the Final Exam?	
	THU 12/8	**Recitation** Final Exam Review (No Quiz)	
	FRI 12/9	**No Class** (Class canceled due to Exam 3)	
17	TUE 12/13	**Final Exam** 8:00am – 10:00am Rooms: LILY 1105, PHYS 114, PHYS 223, STEW 183 (Loeb Playhouse), STEW 314.	The Final Exam will take place in multiple rooms. Please read all announcements and emails to find your exam location.