Math 1A: Calculus – Fall 2020
This class will be conducted completely online.

My goals for you this quarter:
– Pass this class, despite the stresses and constraints of remote instruction
– Be fully prepared to pass your future Calculus courses

Instructor: Cheryl Jaeger Balm
Email: balmcheryl@fhda.edu
Website: https://www.deanza.edu/faculty/balmcheryl/

Office Hours: 2-4pm Mondays; 2-3pm Tuesdays & Thursdays
Details are in the "START HERE!!!" Canvas module.

Tips to get the most from office hours:

- Online quizzes will open every Monday morning and are due Tuesday, so start each quiz **early** to make the most of Monday office hours.

- You will usually have homework due Mondays and Thursdays at 6pm, and quizzes due Tuesdays at 6pm, so start your assignments **before** office hours.

- You can always make an appointment to meet with me (virtually) if you are busy during regular office hours or want to talk one-on-one.

Textbook: *Stewart, Calculus Early Transcendentals* (8th edition) with WebAssign

Canvas (Class Website): All class content, assignments and announcements will be on **Canvas**, which you can access through MyPortal. It is strongly recommended that you also download the **Canvas app** if you have a smart phone.

Once you have accessed **Canvas**, please go to Account → Notifications and adjust your **Notification Preferences** so that you have selected **"Notify me right away"** for Announcement, Submission Comment, Discussion Post and Conversation Message. Other notification settings are up to you.

Calculators: You will need either a graphing calculator or access to the graphing website desmos.com or the Desmos app for some homework problems, but no calculator will be needed for any quizzes of exams.

Homework: You will be given online homework through WebAssign after each section that we cover. In addition, you may also be required to upload written work to Canvas for some assignments. Pay close attention to due dates and do not wait until the last minute to start assignments. Your 3 lowest online homework scores will be dropped. **Your homework will account for 15% of your course grade.**

All assignments must be completed by 6:00pm on the day they are due.
This includes homework, quizzes, exams and projects.

Discussions: Even though this class is online, you are expected to participate and work with your classmates. Each week there will be two discussion boards active in Canvas. One board will be a place to ask and answer homework questions and give study tips on that week's Calculus material, and on the other board you will be prompted to discuss a specific topic in math or education. **These discussions will account for 5% of your course grade.**

Quizzes: Most weeks will include a quiz through WebAssign which will be available from 6:00am Monday until 6:00pm Tuesday. Once you start the quiz, you will have 1 hour to complete it. Quizzes will focus on the material covered since the previous quiz. Your lowest quiz score will be dropped. **Your quizzes will account for 20% of your course grade.**

Midterm Exams: There will be four midterm exams. Each exam will have two parts: an online portion through WebAssign and a handwritten portion which you will upload to Canvas. Once you start the online portion of the exam, you will have 2 hours to complete it. Each midterm exam will focus the material covered since the previous exam. More details on exam dates and procedures can be found in Canvas. **Each midterm exam will account for 10% of your course grade.**

Final Exam: The final exam will be given through WebAssign and will cover all material from throughout the quarter. More details on the final exam will be available on Canvas. **Your final exam will account for 10% of your course grade.**

Projects: Two projects will be assigned during the quarter. Details of each project will be available in Canvas. **Each project exam will account for 5% of your course grade.**

Grading:

Grade			A	B	C	D
Overall percent			≥ 90	≥ 80	≥ 70	≥ 60
Homework	Discussions	9 Quizzes	4 Midterm Exams		Final Exam	2 Projects
15%	5%	20%	40% (10% each)		10%	10% (5% each)

Student resources:

- Your classmates: Participate in the Canvas Discussion boards and form virtual study groups to learn from one another.

- MSTRC (Math, Science and Technology Resource Center): Since campus is closed, free online tutoring via Zoom is available instead, along with Academic Skills Workshops. More details can be found here https://www.deanza.edu/studentsuccess/.

- Your instructor: Make use of office hours, Canvas Inbox and WebAssign "Ask My Professor". **Do not wait until you are drowning to get help!**

Disability Statement: De Anza College makes reasonable accommodations for people with documented disabilities. Please notify Disability Support Programs and Services (DSPS) if you have any physical, psychological or other disabilities, vision, hearing impairments or ADD/ADHD. DSPS is still operating remotely while campus is closed. More details can be found here https://www.deanza.edu/dsps/

Academic Integrity: Learning involves the pursuit of truth, which cannot be pursued by presenting someone else's work as your own. Each student must pursue their academic goals honestly and be personally accountable for all submitted work. Representing another person's work as your own is always wrong. Any suspected instance of academic dishonesty on any assignment will be reported to the college and may result in a 0 on the assignment and/or a failing grade in the class. For more comprehensive information on academic integrity, including categories of academic dishonesty, please refer to https://www.deanza.edu/policies/academic_integrity.html.

Tentative class schedule (subject to change):

Week	Topics and Sections
Wk 1 9/21-25	Introductions Prerequisites and prior knowledge (Ch.1) ROC and tangent lines (2.1) Limits (2.2)
Wk 2 9/28 - 10/2	Limit laws (2.3) Continuity (2.5) Intro to derivatives (2.7, 2.8)
Wk 3 10/5-9	**Exam 1** Polynomial and exponential derivatives (3.1) Product and quotient rules (3.2)
Wk 4 10/12-16	Trig derivatives (3.3) Linear approximation and differentials (3.10) Newton's Method (4.8)
Wk 5 10/19-23	**Exam 2** **Start Project 1** Chain rule (3.4) Implicit differentiation (3.5)
Wk 6 10/26-30	Logarithmic differentiation (3.6) Related rates (3.9)
Wk 7 11/2-6	**Project 1 due** Parametric equations (10.1, 10.2)
Wk 8 11/9-13	**Exam 3** Infinite limits and horizontal asymptotes (2.6) l'Hôpital's Rule (4.4)
Wk 9 11/16-20	Maxima and minima (4.1) Mean Value Theorem (4.2) Curve sketching (4.3, 4.5) **Start Project 2**
Wk 10 11/23-27	No new material (Thanksgiving Break)
Wk 11 11/30 - 12/4	Optimization (4.7) Antiderivatives (4.9) **Project 2 due** **Exam 4**
Wk 12 12/7-11	**Final Exam** **Have a great winter break!!!**

Student Learning Outcome(s):

*Analyze and synthesize the concepts of limits, continuity, and differentiation from a graphical, numerical, analytical and verbal approach, using correct notation and mathematical precision.
*Evaluate the behavior of graphs in the context of limits, continuity and differentiability.
*Recognize, diagnose, and decide on the appropriate method for solving applied real world problems in optimization, related rates and numerical approximation.