

MATH 181 : ELEMENTS OF CALCULUS II

Section 501 (M/W 9:00 - 10:15), CRN 49078

Spring 2019

Instructor: Ian Burch

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Office and Hours: A123 M/T/W/Th 8:30 - 9:00

A123 T/Th 10:30 - 11:45

Stem Center M/W - 12:00 - 1:30

Course Goals

Continue exploring derivatives and integrals by developing integration techniques and applications. Use of integration for real-world applications like continuous averages and volumes. An introduction to first-order differential equations, Euler's method, and their numerous applications. Development of sequences and series and their applications, and an overview of Taylor polynomials.

Materials:

- Lial, Greenwell, & Ritchey, *Calculus with Applications*, 10th or 11th Edition
- Scientific or Graphing calculator
- Folder

Expectations: Students are expected to conduct themselves in a professional and collegial manner. Please refrain from using cell phones during class unless approved in advance by instructor. Absences may be excused only with a documented reason, preferably given in advance. Students with more than 4 absences may be dropped from the course.

Disability Statement: If you have a documented disability, please provide me with a copy of your letter from Equal Access Services as soon as possible to ensure that accommodations are provided in a timely manner. If you feel you need accommodations but have not documented your disability, please contact Jeanne Lujan, the coordinator for Equal Access Services at 925-8910 or jmlujan@unm.edu

Academic Honesty: Each student is expected to maintain the highest standards of honesty and integrity in academic and professional matters. The University reserves the right to take disciplinary action, including dismissal, against any student who is found responsible for academic dishonesty. Any student who has been judged to have engaged in academic dishonesty in course work may receive a reduced or failing grade for the work in question and/or for the course. Academic dishonesty includes, but is not limited to, dishonesty in quizzes, tests or assignments, claiming credit for work not done or done by others; hindering the academic work of other students; and misrepresenting academic or professional qualifications within or outside the University.

Title IX : In an effort to meet obligations under Title IX, UNM faculty, Teaching Assistants (TA), and Graduate Assistants (GA) are considered responsible employees. This designation requires that any report made to a faculty member, TA, or GA regarding sexual misconduct or

gender discrimination must be reported to the Office of Equal Opportunity and the Title IX Coordinator. For more information on the campus policy regarding sexual misconduct, see: <https://policy.unm.edu/university-policies/2000/2740.html>

Late Work :

Homework past the due date will not be accepted without an emailed or written request prior to the deadline.

Grade Breakdown

Final Exam	30%
Midterm Exam	25%
Homework	25%
Weekly Quizzes	15%
Attendance	5%

Letter grades will be given as follows, with + or - given for the highest and lowest 3% in each range, respectively. Incomplete (I) grades will not be assigned without extenuating, documented circumstances

90% - 100%	A
80% - 89%	B
70% - 79%	C
60% - 69%	D
0% - 59%	F

Tentative Schedule :

Week 1: Basic Integration	Week 14: Series
Week 2: Area & Substitution	Week 15: Taylor Polynomials
Week 3: Fnd Thm of Calculus (HW Check)	Week 16: Finals
Week 4: Numerical Integration	
Week 5: Integration by Parts	
Week 6: Applications, Averages	
Week 7: Applications, Volume (HW check)	
Week 8: Review & Midterm (Mar 6hh)	

- Week 9: Vector Fields
- Week 10: Differential Equations
- Week 11: Applied DiffEq
- Week 12: Applied DiffEq
- Week 13 :Sequences