

# Math 264: Unified Calculus & Analytic Geometry IV

## Mathematics

This is the fourth course in a four-term calculus sequence for engineering and science majors. Topics include limits, continuity, and partial differentiation of functions of several real variables, directional derivatives and gradient, tangent planes and linear approximation, maximum and minimum problems, Lagrange multipliers, double and triple integrals in Cartesian, polar, and spherical coordinates, vector fields, line integrals, Green's theorem, surface integrals, Stokes' theorem.

3 Credits

### Prerequisites

- [Math 263: Unified Calculus & Analytic Geometry III](#) (Minimum grade: C)

### Instruction Type(s)

- Lecture: Lecture for Math 264

### Course Fee(s)

#### Mathematics

- \$35.00 for:
  - 2022-23: Fall, Second Fall, Winter, Spring, First Spring, Second Spring, May, Full Summer, First Summer, Second Summer, August
- \$40.00 for:
  - 2023-24: Fall, First Fall, Second Fall

### Subject Areas

- [Mathematics, General](#)

### Related Areas

- [Algebra and Number Theory](#)
- [Analysis and Functional Analysis](#)
- [Geometry/Geometric Analysis](#)
- [Topology and Foundations](#)

