There are several options for the textbook. Officially, the text is:

**Calculus – Early Transcendentals, 6th edition** by James Stewart.

The 7th edition of the text is out so you should be able to find cheap used copies of the 6th edition. Since this is 3rd semester calculus, it doesn’t really matter whether or not you have the “early transcendental” version or not, since that only affects the ordering of material in the first 2 semesters. The chapter numbering may be off by one (e.g. Ch 12 in one book is Ch 13 in the other) and the page numbers may be different, but the material and problems should be the same.

There is also a version of the text which contains only the material for third semester (i.e. multivariable) calculus. It may have the same differences as the non-early transcendental version, chapters and pages being different.

Here are what I believe are the ISBNs, but these may not be correct. I got them from Amazon, not the publisher of the text.


What about other editions? Other editions exist. The 7th edition is out. Its cover is mostly white. (Earlier editions generally have dark covers.) It will probably be more expensive. If you plan to sell your book to other students when you are done (which is a stupid thing to do unless you know everything in the book, or unless you have another calculus text) then it would probably be better to buy the 7th edition. The 5th edition (and earlier editions) are probably even cheaper and are not significantly different. The sections are a bit different and the homework problems may be different, but I don’t collect homework, so doing similar problems (instead of the exact same problems as those assigned) is usually fine. It may be possible for you to find an earlier version of the text that is so cheap that it costs less than what you would lose if you bought the current (7th) edition and sold it back at the end of the semester.

The next two pages show which chapters we will be covering in the course.
Math 220

Stewart – 6th edition
Chapter 12: Vectors and the Geometry of Space
Chapter 13: Vector Functions
Chapter 14: Partial Derivatives
Chapter 15: Multiple Integrals
Chapter 16: Vector Calculus

Chapter 12: Vectors and the Geometry of Space
12.1 3-D Coordinate Systems
12.2 Vectors
12.3 The Dot Product
12.4 The Cross Product (vector product)
12.5 Equations of Lines and Planes
12.6 Cylinders and Quadric Surfaces

Chapter 13: Vector Functions
13.1 Vector Functions and Space Curves
13.2 Derivatives and Integrals of Vector Functions
13.3 Arc Length and Curvature
13.4 Motion in Space: Velocity and Acceleration

Chapter 14: Partial Derivatives
14.1 Functions of Several Variables
14.2 Limits and Continuity
14.3 Partial Derivatives
14.4 Tangent Planes and Linear Approximations
14.5 The Chain Rule
14.6 Directional Derivatives and the Gradient Vector
14.7 Maximum and Minimum Values
14.8 Lagrange Multipliers
Chapter 15: Multiple Integrals
15.1 Double Integrals over Rectangles
15.2 Iterated Integrals
15.3 Double Integrals over General Regions
15.4 Double Integrals in Polar Coordinates
15.5 Applications of Double Integrals
15.6 Triple Integrals
15.7 Triple Integrals in Cylindrical Coordinates
15.8 Triple Integrals in Spherical Coordinates
15.9 Change of Variables in Multiple Integrals

Chapter 16: Vector Calculus
16.1 Vector Fields
16.2 Line Integrals
16.3 The Fundamental Theorem for Line Integrals
16.4 Green’s Theorem
16.5 Curl and Divergence
16.6 Parametric Surfaces and Their Areas
16.7 Surface Integrals
16.8 Stokes’ Theorem
16.9 The Divergence Theorem
16.10 Summary