The Fundamental Theorem of Calculus (5.4)

Expected Skills.
At the end of this section, students will be able to:

- explain in words the two parts of the fundamental theorem of calculus and why it is important,
- mathematically state the two parts of the fundamental theorem of calculus,
- use the fundamental theorem of calculus to compute definite integrals.

Worksheet (ch5-integrals-4-ftc-1-ws)**.** In the class activity, students are introduced to the antiderivative of a function as an area accumulation function and the first part of the Fundamental Theorem of Calculus. The goal is for students to

1. explain in words and graphically the antiderivative of a function
2. explain in words the connection between antiderivatives and integrals

Worksheet (ch5-integrals-4-ftc-2-ws)**.** In the class activity, students are introduced to the second part of the fundamental theorem of calculus.