Constructing Linear Functions

How can you determine what your income will be in 5 years if you get a 3 percent raise each year?

How do companies predict the amount of money they will earn or spend in a year?

How does a botanist figure out how tall a tree will be in 20 years?

They can use linear equations!

In fact, you can use a linear function to model any real-world situation involving a constant rate of change and an initial value.

A linear equation can be written in slope-intercept form, y is equal to mx plus b.

In this form m is the rate of change and b is the function's initial value.

In this lesson, you will learn when to use a linear function to model a scenario.

You will also learn how to write the function using a table, a graph, or a description of it.