

Unit 3

Family Letter

Reveal
MATH

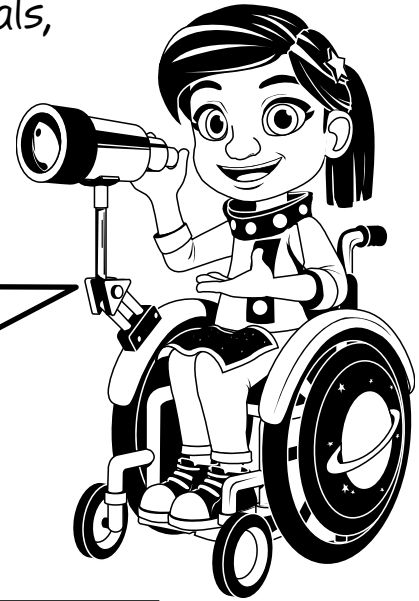
Dear Family,

In this unit, Place Value and Number Relationships, your child will learn about place value, decimals, comparing, and rounding.

STEM Career Kid for this Unit

Hi, I'm Haley.

I want to be an astronomer. I will use math in my job when I find the number of miles between planets. I will show students how I will round decimals in my work.



What math terms will your child use?

Term	Student Understanding
and	the written and oral representation of the decimal point in a number
tenths	the place value of the first digit to the right of the decimal point in a number
hundredths	the place value of the second digit to the right of the decimal point in a number
thousandths	the place value of the third digit to the right of the decimal point in a number

What can your child do at home?

In this unit, it is important for students to be able to identify the place value of decimals. Practice identifying place values with your child. Write *tens*, *ones*, *tenths*, *hundredths*, and *thousandths* on separate index cards. Then write a decimal on a sheet of paper. Point to each digit, and have your child hold up the place-value card that shows the place value to which you are pointing. Repeat with different decimals.



What Will Students Learn in This Unit?

Generalizing Place Value

Your child will learn that when you move to the left one place in a number, the value of the digit is 10 times as much. When you move to the right one place, the value of the digit is $\frac{1}{10}$ times as much. Students will learn that this relationship also applies to decimals, such as comparing the value of the 8 in 3.85 to the value of the 8 in 2.78.

The digit 8 is in the tenths place in 3.85, so its value is 0.8. The digit 8 is in the hundredths place in 2.78, so its value is 0.08. Therefore 0.8 is 10 times as much as 0.08 and 0.08 is $\frac{1}{10}$ as much as 0.8.

Read and Write Decimals

Your child will read and write decimals to thousandths. Children will learn three ways to express decimal numbers: standard form, expanded form, and word form. The word *and* is used to represent the decimal point.

standard form: 3.652

expanded form: $3 + 0.6 + 0.05 + 0.002$

word form: three and six hundred fifty-two thousandths

Comparing Decimals to Thousandths

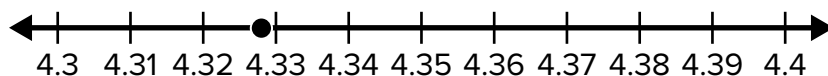
Your child will compare two decimals to the thousandths place using place value and a number line. It is important that students line up the decimal point when comparing with place value. The strategies show how to compare 5.847 and 5.841.

$$\begin{array}{r} 5.\boxed{8}47 \\ 5.\boxed{8}41 \end{array}$$

$5.847 > 5.841$

Rounding Decimals

Your child will round decimal numbers to different place values. A number line can show how to estimate 4.328 to the tenths place.



Since 4.328 is closer to 4.3 than to 4.4, the decimal 4.328 rounded to the nearest tenth is 4.3.