Unit **11**
Family Letter

Reveal **MATH**®

Dear Family,

In this unit, Data Analysis, we will be learning about picture graphs, bar graphs, and line plots.

STEM Career Kid for this Unit

Hi, I'm Hugo.

Hello! My name is Hugo, and I want to be a meteorologist. Meteorologists use math when they record the weather for a month.

What math terms will your child use?

Term	Student Understanding
bar graph	a graph that uses bars to show data
data	information that is collected
line plot	a graph that shows how often a certain number occurs in a data set
picture graph	a graph that has different pictures to show information that has been collected
tally chart	a chart that shows the answers to a question

Math @ Home Activity

What can your child do at home?

Look for examples of tally charts, picture graphs, bar graphs, and line plots in magazines and online resources. Discuss with your child what each graph represents and what information can be learned from it.
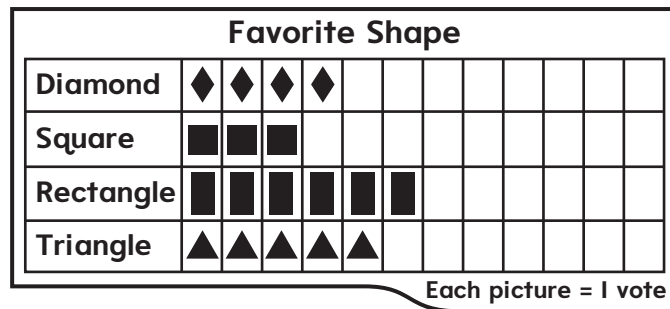
What Will Students Learn in This Unit?

Picture Graphs

In this unit, your child learns that picture graphs use pictures to display data. Your child also learns that picture graphs are one way to understand data. For example, when looking at a picture graph, it can be determined which data value occurs most and which occurs least. Your child will answer questions that relate to given picture graphs and will draw picture graphs.

Example

Which shape got the most votes? Rectangles

Favorite Shape

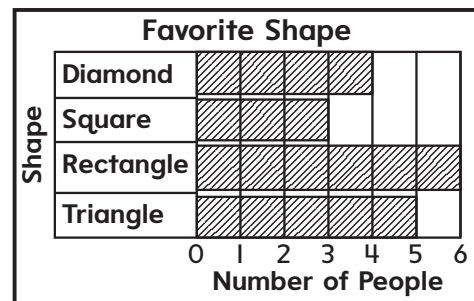| Diamond | ◆ ◆ ◆ ◆ |
Square	■ ■ ■
Rectangle	■ ■ ■ ■ ■
Triangle	▲ ▲ ▲ ▲ ▲

Each picture = 1 vote

Bar Graphs

Your child also learns that a bar graph uses either vertical or horizontal bars to display data. The bars and numbers help in making comparisons of the data displayed. Your child will learn how to interpret data shown in a bar graph, will use a bar graph to solve problems, and will draw bar graphs.

Example

Did triangles or squares get more votes? Triangles

Favorite Shape

Shape: Diamond, Square, Rectangle, Triangle

Number of People: 0 1 2 3 4 5 6

Line Plots

Your child also learns how to analyze data that is displayed in a line plot. He or she will then answer questions related to the data. Students will also measure the lengths of objects and make line plots to display the measurement data.

Example

What square length is most common? 17 inches

```
                          X
                   X      X
            X      X      X      X
     X      X  X   X      X      X  X
 10 11 12 13 14 15 16 17 18 19 20
```

Square Lengths (inches)