

Tools and Topics

Inspiring Connections Course 1, Chapter 10

Spotlight On: Fostering Curiosity

This year, your student's teacher has been working to foster curiosity by encouraging students to think about mathematics and the world in new ways. The explorations that result from students' questions promote higher-order thinking through analyzing, evaluating, and creating new ideas.

The Big Picture

Growing From

Number lines;
Integers;
Area;
Measures of center

Working On

Coordinate plane;
Surface area;
Volume;
Mean absolute deviation

Growing To

Cross sections;
Statistical calculations

Need Help?

Methods & Meanings boxes are included in the Mathematician's Notebook as reference.

10.2.3: Prisms and Pyramids
10.2.4: Surface Area and Nets
10.2.5: Measurement in Different Dimensions
10.2.6: Volume of a Prism
10.3.3: Mean Absolute Deviation

Try This at Home!

As the end of this course approaches, take some time to look through your student's goal journal together. Ask your student what ways they have experienced growth this year and what their goals are for next year.

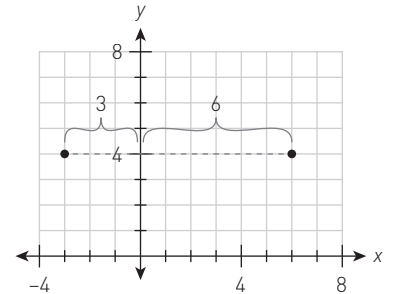


Current Topics

In this chapter, students will apply the graphing, geometry, and statistical skills and tools they acquired in earlier chapters to measure distance on a coordinate plane, calculate the volume and surface area of prisms and pyramids, and determine the mean absolute deviation of a dataset.

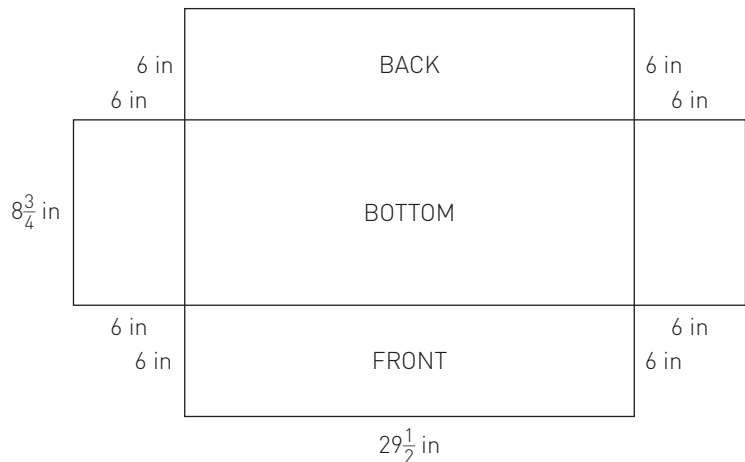
Two Dimensions (Section 10.1)

In this section, students will calculate vertical or horizontal distances on a coordinate plane.



Three Dimensions (Section 10.2)

In this section, students use nets to investigate properties of prisms and pyramids. A net is the flat surface obtained by "unwrapping" a solid. Several examples are shown in the Methods & Meanings box in Lesson 10.2.4. Students will use a solid's net and their knowledge of areas of two-dimensional shapes to determine the surface area of a solid, then use that knowledge to calculate volume as well.



More Data (Section 10.3)

In this section, students learn how to measure variability of data by calculating the mean absolute deviation (MAD). "Mean" is another word for "average," and "deviation" is the distance from a data point to the average of all the data. MAD measures the average distance of the data points from the mean, so a higher MAD implies data that is more spread out.

