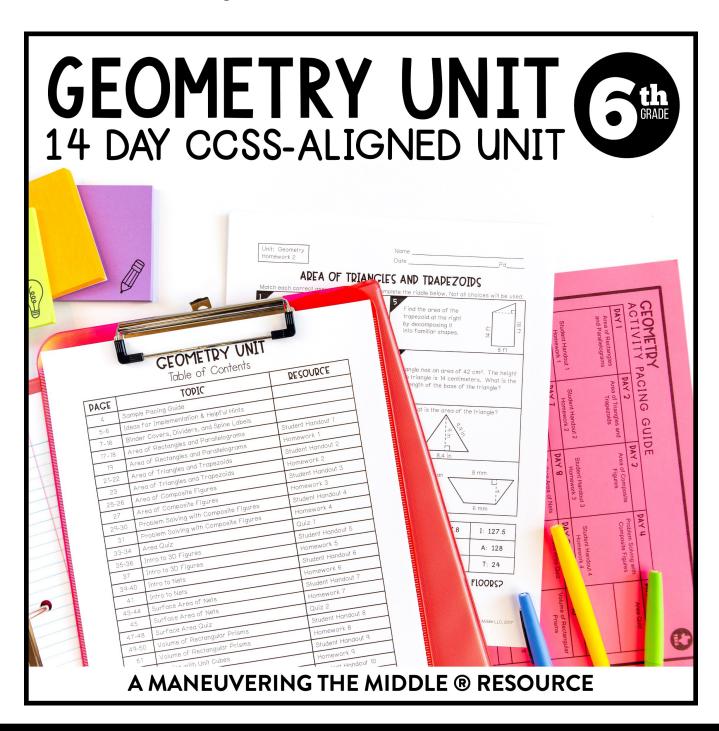
learning focus:

- calculate area of 2D shapes and composite figures
- use nets to represent 3D figures and calculate surface area
- find volume of rectangular prisms with rational lengths and unit cubes





a 14 day CCSS-aligned unit

CCSS: 6.G.1, 6.G.2, 6.G.4

ready-to-go, scaffolded student materials

GEOMETRY UNIT

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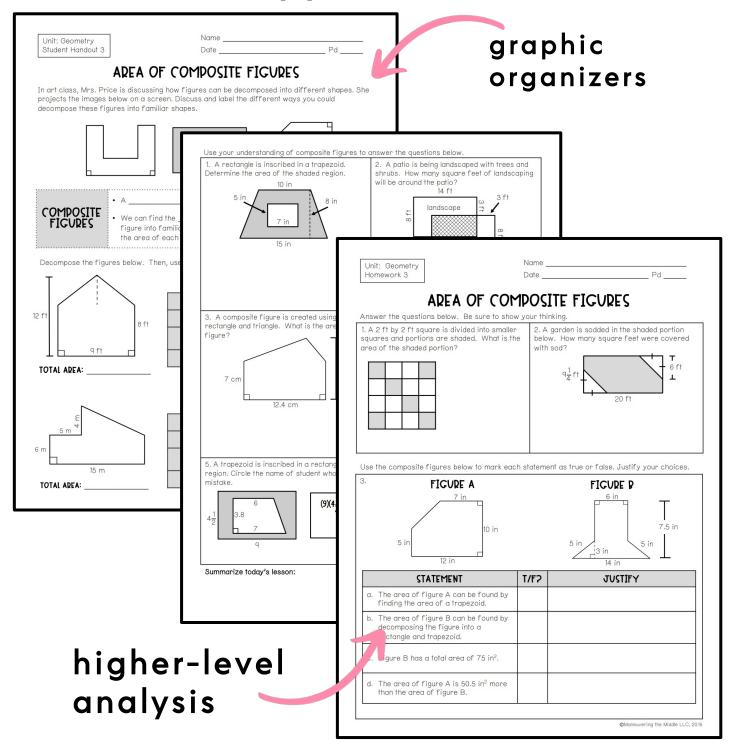
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a 14 day CCSS-aligned unit CCSS: 6.G.1, 6.G.2, 6.G.4

student friendly + real-world application





a 14 day CCSS-aligned unit

CCSS: 6.G.1, 6.G.2, 6.G.4

streamline your planning process with unit overviews



ccss

STANDARDS

6.G.1 Find the area of right triangles, other triangles, special quadrilaterals, and polygons by composing into rectangles or decomposing into triangles and other shapes; apply these techniques in the context of solving real-world and mathematical problems.

6.6.2 Find the volume of a right rectangular prism with fractional edge lengths by packing it with unit cubes of the appropriate unit fraction edge lengths, and show that the volume is the same as would be found by multiplying the edge lengths of the prism. Apply the formulas V=M and V=M to find volumes of right rectangular prisms with fractional edge lengths in the context of solving real world and mathematical problems.

6.G.4 Represent three-dimensional figures using nets made up for rectangles and triangles, and use the nets to find the surface area of these figures. Apply these techniques in the context of solving real world and mathematical problems.



key vocabulary



Student Handout 4

vertical alignment

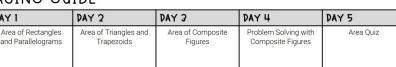


- A figure can be decompose
- The volume of a rectangular
- The area of a 2D figure description

ESSENTIAL QUESTION

- · Why do different shapes ha
- How are a net and a 3D figurence
- · How can the surface area o

GEOMETRYPACING GUIDE



Student Handout 3

Student Handout 1 Student Handout 2 Homework 1 Homework 2

Homework 1

DAY 6

DAY 7

Intro to 3D Figures

Student Handout 5
Homework 5

DAY 11

DAY 12

Packing with Unit
Cubes

Homework 1

Homework 2

Homework 2

Student Handout 6
Homework 6

DAY 12

Volume with Rational
Lengths

Student Handout 10

Homework 10

Student Handout 9

Homework 9

teaching ideas







TOPIC	TEACHING TIDS	
Area	Ilove teaching area as a covering of a 2D object. This could be as simple as using graph paper to color various shapes with various dimensions. Students could create a picture with various shapes or even spell out their name. Cheez-Its® are also great ways for students to physically cover an object. Consider giving students a specific number of Cheez-Its®, and then ask them the various dimensions that can be created with that area.	
Composite Figures	Consider having students draw the various shapes independent of each other with the measurements. Then, ask them to find the area of each shape. Finally, have them add or subtract based on the situation. By breaking these down into separate images, students tend to do better and use the appropriate measurements.	
Nets and Surface Area	To introduce nets and surface area, collect various boxes with different bases. Cut the edges and any excess that would not be a part of the net. Help students to see the various parts of the 3D object and how the net comes together. As an exploratory option, ask students to use their ruler to measure the different dimensions and find the surface area.	
Volume	Since volume is the space that a 3D object occupies, there are lots of great hands-on options. From a rubix cube to filling an object with unit cubes, have students explore with their hands.	

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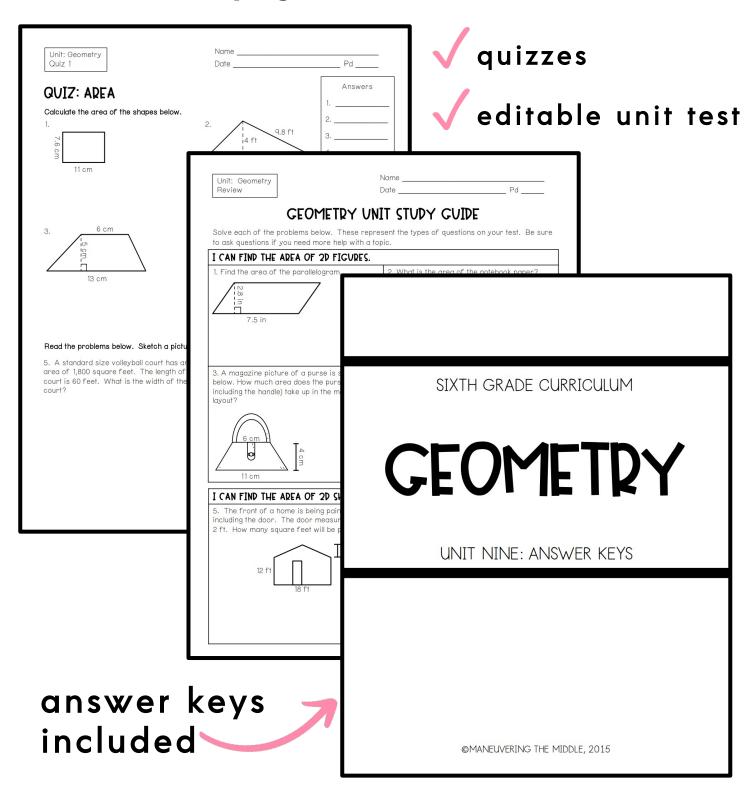
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CCSS: 6.G.1, 6.G.2, 6.G.4

unit study guide + assessments



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