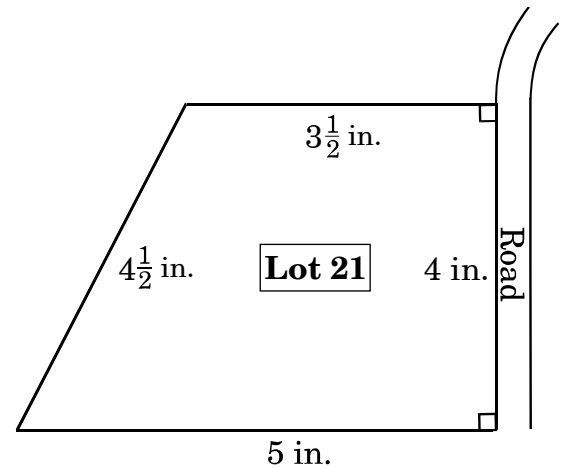


1. A drawing of a deck has a scale of 1 inch equal to 5 feet. The actual deck is 18 feet long. How long is the deck in the scale drawing?
- A 5.0 inches
 B 3.6 inches
 C 1.3 inches
 D 0.3 inch

2. Lot 21 is a trapezoid with the two bases perpendicular to the road. The scale drawing below uses the scale $\frac{1}{2}$ inch = 40 feet.



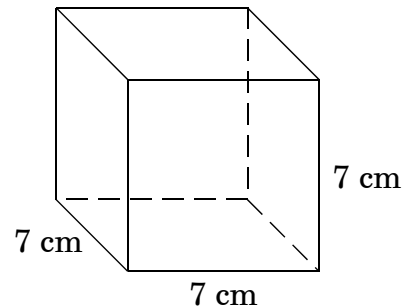
What is the **approximate** area of Lot 21? $\left[A = \frac{1}{2}h(b_1 + b_2) \right]$
 (1 acre = 43,560 square feet)

- A $\frac{1}{2}$ acre
 B 2 acres
 C $2\frac{1}{2}$ acres
 D 3 acres

3. A rectangular piece of land will be divided diagonally into two congruent triangular sections. One section will be covered with grass, and the other section will be paved. The blueprint measurements for the piece of land are 5 inches wide by 12 inches long. The blueprint scale is $\frac{1}{4}$ inch = 10 feet. How much area will paved?
- A 2,400 ft²
B 9,600 ft²
C 48,000 ft²
D 96,000 ft²

4. A swimming pool is 50 meters long, 25 meters wide, and 3 meters deep. A liter is the same as 0.001 cubic meter. How many liters of water are needed to fill the pool?
- A 375 liters
B 3,750 liters
C 375,000 liters
D 3,750,000 liters

5. What is the **approximate** volume of a cylinder with a radius of 4 feet and a height of 15 feet?
- A 189 cubic feet
B 377 cubic feet
C 754 cubic feet
D 1,508 cubic feet
6. Donna has a cube that measures 7 cm on each edge.



What is the surface area of the cube?

- A 343 cm²
B 294 cm²
C 49 cm²
D 21 cm²

End of Goal 2 Sample Items

In compliance with federal law, including the provisions of Title IX of the Education Amendments of 1972, the Department of Public Instruction does not discriminate on the basis of race, sex, religion, color, national or ethnic origin, age, disability, or military service in its policies, programs, activities, admissions of employment.

Answers to EOG Grade 7 Math Sample Items

Goal 2

1. Objective 2.01

Draw objects to scale and use scale drawings to solve problems.

Thinking Skill: Applying **Correct Answer:** B

2. Objective 2.01

Draw objects to scale and use scale drawings to solve problems.

Thinking Skill: Analyzing **Correct Answer:** C

3. Objective 2.01

Draw objects to scale and use scale drawings to solve problems.

Thinking Skill: Analyzing **Correct Answer:** C

4. Objective 2.02

Solve problems involving volume and surface area of cylinders, prisms, and composite shapes.

Thinking Skill: Integrating **Correct Answer:** D

5. Objective 2.02

Solve problems involving volume and surface area of cylinders, prisms, and composite shapes.

Thinking Skill: Applying **Correct Answer:** C

6. Objective 2.02

Solve problems involving volume and surface area of cylinders, prisms, and composite shapes.

Thinking Skill: Applying **Correct Answer:** B