Lesson 11.7

Understand Volume

Use the unit given. Find the volume.

1. 
   
   \[
   \text{Volume} = 105 \text{ cu cm}
   \]

2. 
   
   \[
   \text{Volume} = \quad \text{cu} \quad \text{in.}
   \]

3. 
   
   \[
   \text{Volume} = \quad \text{cu} \quad \text{ft}
   \]

4. 
   
   \[
   \text{Volume} = \quad \text{cu} \quad \text{in.}
   \]

5. Compare the volumes. Write $<$, $>$, or $=$.

\[
\text{cu ft} \quad 4 \text{ ft} \quad 5 \text{ ft}
\]

\[
\text{cu ft} \quad 6 \text{ ft} \quad 5 \text{ ft}
\]

Problem Solving

6. A manufacturer ships its product in boxes with edges of 4 inches. If 12 boxes are put in a carton and completely fill the carton, what is the volume of the carton?

7. Matt and Mindy each built a rectangular prism that has a length of 5 units, a width of 2 units, and a height of 4 units. Matt used cubes that are 1 cm on each side. Mindy used cubes that are 1 in. on each side. What is the volume of each prism?
Lesson Check (CC.5.MD.3b, CC.5.MD.4)

1. Elena packed 48 cubes into this box. Each cube has edges that are 1 centimeter. How many layers of cubes did Elena make?

- A) 2
- B) 3
- C) 4
- D) 8

2. What is the volume of the rectangular prism?

- A) 40 cubic inches
- B) 40 cubic feet
- C) 240 cubic inches
- D) 240 cubic feet


3. Juan made a design with polygons. Which polygon in Juan’s design is a pentagon? (Lesson 11.1)

- A) Figure A
- B) Figure B
- C) Figure C
- D) Figure D

4. Which ordered pair describes the location of point X? (Lesson 9.2)

- A) (3, 4)
- B) (4, 3)
- C) (4, 4)
- D) (3, 3)

5. What is the least number of acute angles that a triangle can have? (Lesson 11.2)

- A) 0
- B) 1
- C) 2
- D) 3

6. Karen bought 3 pounds of cheese to serve at a picnic. How many ounces of cheese did Karen buy? (Lesson 10.3)

- A) 24 ounces
- B) 32 ounces
- C) 36 ounces
- D) 48 ounces