

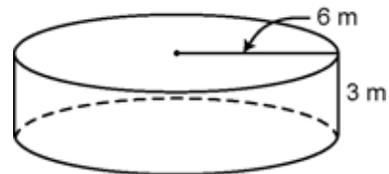
Chapter 7 Test

For #1 to #5, choose the best answer.

- Which units can be used to express volume?
A cm^2 **B** dm^2 **C** km^3 **D** m
- What is the volume of a right prism with a base area of 4.6 cm^2 and a height of 9.3 cm ?
A 13.9 cm^3 **B** 18.5 cm^3 **C** 21.39 cm^3 **D** 42.78 cm^3

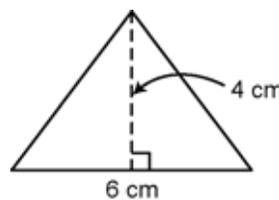
- What is the volume of this right cylinder?

- A** 113.04 m^3
B 169.56 m^3
C 339.12 m^3
D 678.24 m^3



- What is the height of a triangular prism with a volume of 96 cm^3 and this triangular base?

- A** 4 cm
B 6 cm
C 8 cm
D 16 cm

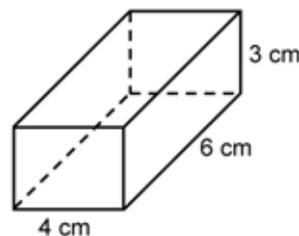


- What is the volume of a cube with an edge length of 2.3 m ?
A 12.2 m^3 **B** 24.3 m^3 **C** 36.5 m^3 **D** 48.7 m^3

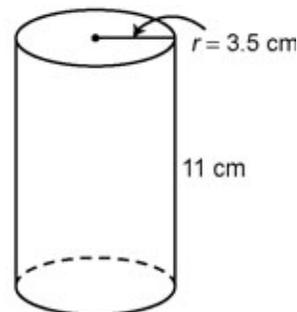
Short Answer

- Calculate
 - the area of the base of a rectangular prism with a triangle height of 8 m and a triangle base of 2 m
 - the volume of a right cylinder with a radius of 6 mm and a height of 5 mm
 - the volume of a cube with an edge length of 6 cm
 - the volume of a right rectangular prism with dimensions $8.1 \text{ cm} \times 5.3 \text{ cm} \times 10 \text{ cm}$
 - the area of the base of a right cylinder with a radius of 5 m
 - the height of a cube with a volume of 343 cm^3 and a base area of 49 cm^2
 - the area of the base of a right triangular prism with a volume of 392.7 km^3 and a height of 8.5 km

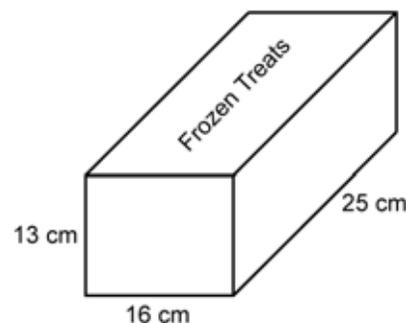
7. What is the volume of this right rectangular prism?



8. Lee placed three ice cubes with edge lengths of 2 cm in this glass. What volume of juice will he add to fill the glass to the top?

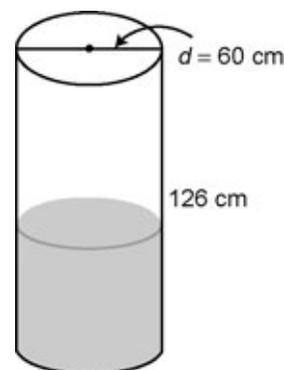


9. The inside of a freezer has a volume of 3.5 m^3 . What is the volume of the space left in the freezer after 120 boxes of these frozen treats are placed in it?



10. Jared fills this right cylinder barrel half-full of water.

- a) What is the volume of the water in the barrel?
 b) If $1 \text{ m}^3 = 1\,000\,000 \text{ cm}^3$, how many m^3 is the volume of water in the barrel? Round your answer to two decimal places.



Extended Response

11. What is the volume of this right rectangular prism shape? Round your answer to two decimal places.

