

Measuring Solid Volume

Work in pairs to measure the VOLUME of the following IRREGULAR shaped objects using the “Water Displacement” method. Fill the graduated cylinder with a known quantity. Gently place the object into the cylinder to determine the objects volume. Be sure to convert the liquid volume unit to the solid volume unit.

1. Marble Volume = final volume – initial volume = _____ -- _____ = _____
2. Metal Cylinder Volume = final volume – initial volume = _____ -- _____ = _____
3. 5 pennies Volume = final volume – initial volume = _____ -- _____ = _____
4. 1 plastic cube Volume = final volume – initial volume = _____ -- _____ = _____
5. 8 plastic cubes Volume = final volume – initial volume = _____ -- _____ = _____
6. Rubber Eraser Volume = final volume – initial volume = _____ -- _____ = _____

Analysis: Practice calculating volume with given length, width, and heights. Pay attention to the units of each problem as you will need to convert your measurements into the desired answer. Use your “King Henry Died Monday Drinking Chocolate Milk” tool to convert.

A. L = 2 cm W = 2 cm H = 2 cm
Volume = _____ cm X _____ cm X _____ cm = _____ cm³

B. L = 200 mm W = 424 mm H = 22 mm
Volume = _____ cm X _____ cm X _____ cm = _____

C. L = 12 mm W = 60 mm H = 28 mm
Volume = _____ cm X _____ cm X _____ cm = _____

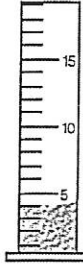
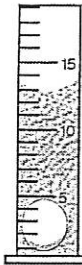
D. L = .8 Km W = .2 Km H = .4 Km
Volume = _____ m X _____ m X _____ m = _____

E. L = 450 cm W = 2000 cm H = 125 cm
Volume = _____ m X _____ m X _____ m = _____

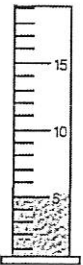
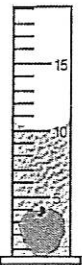
F. L = 10 m W = 8 m H = 1 m
Volume = _____ cm X _____ cm X _____ cm = _____

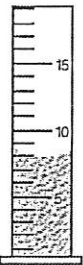

Volume by Water Displacement

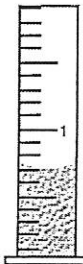

Name _____
 Date _____
 Period _____

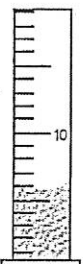
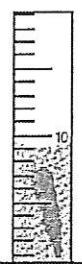
1.  


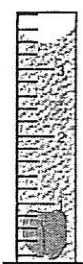
Volume of graduate with object: _____
 Volume of graduate without object: _____
 Volume of object: _____

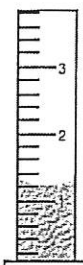

2.  

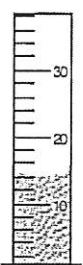
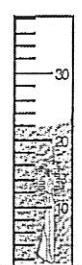
3.  



4.  

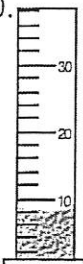

5.  

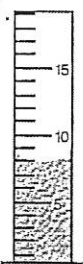
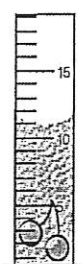
6.  

7.  

8.  

9.  

10.  

11.  

12. 