Mathematics, Grade 6 Unit V: Lesson 5

Table: Volume Comparison



Review metric measurement units for length and capacity. Review the formulas for finding the volume of a rectangular prism and a cylinder. Obtain several examples of rectangular prisms and cylinders such as milk cartons, boxes, cans, etc. Obtain a glass beaker that is marked with milliliter designations.

Use a ruler marked in millimeters to measure the dimensions of your rectangular solids and cylinders. Use these measurements and the formulas to calculate the volume in cubic millimeters. Fill your examples of rectangular solids and cylinders with water, beads or other such filler. Pour the filler into your marked glass beaker. Use the marks to find the number of milliliters of filler the solid contained. Compare this to the answer you got from your formula calculations. Record the answers for both processes in a table. Explain which is more accurate and why.

Share your experiment with the class.