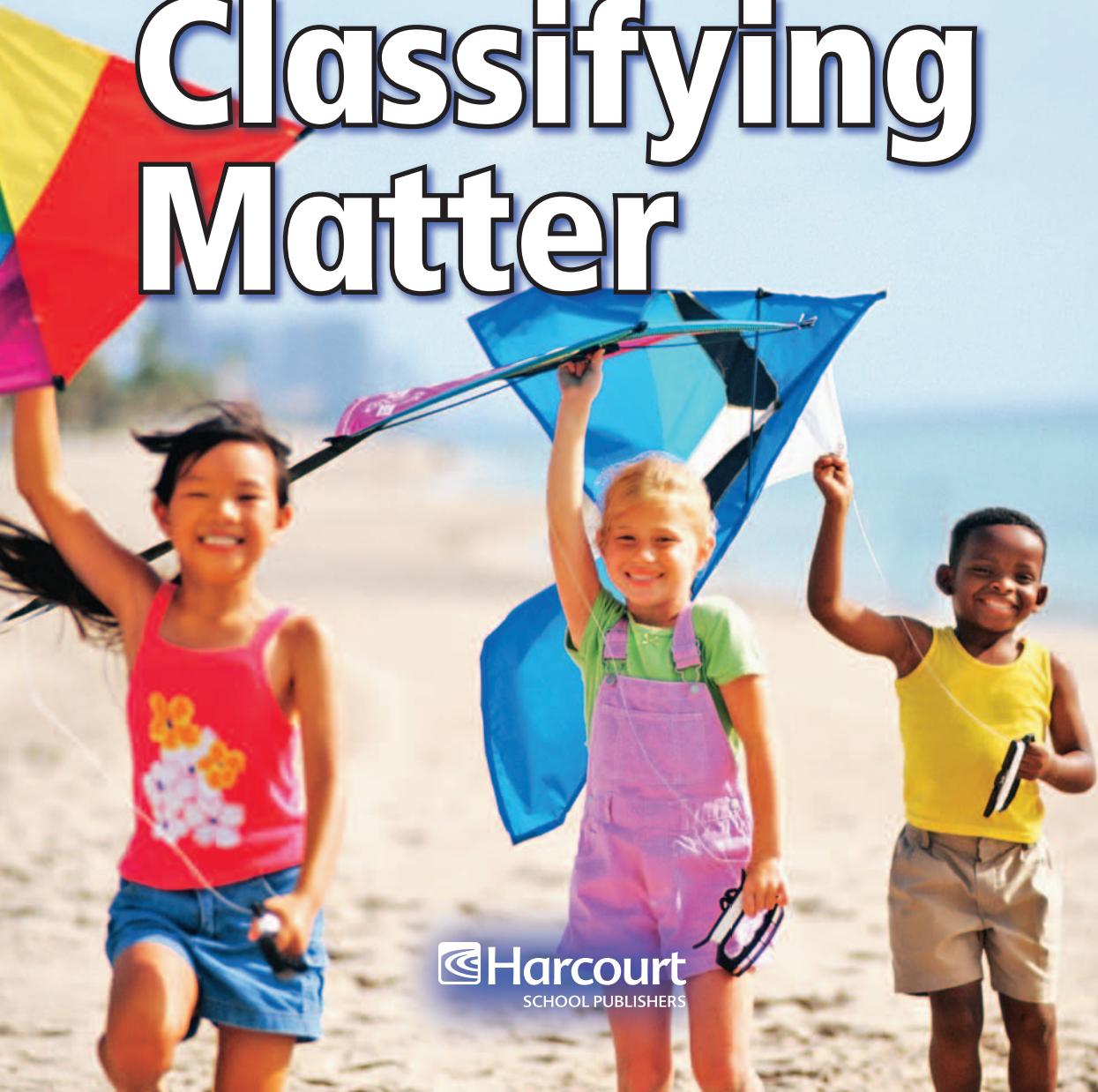


# Observing and Classifying Matter



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# **Observing and Classifying Matter**

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# Matter



Matter is what all things are made of.  
All matter takes up space.  
All matter has mass.  
These are properties of matter.



Size is also a property of matter.  
Color and shape are other properties.

# Solids



A solid is a form of matter.  
Some solids are hard. Some are soft.  
Solids are different sizes and colors.  
Solids have different textures.

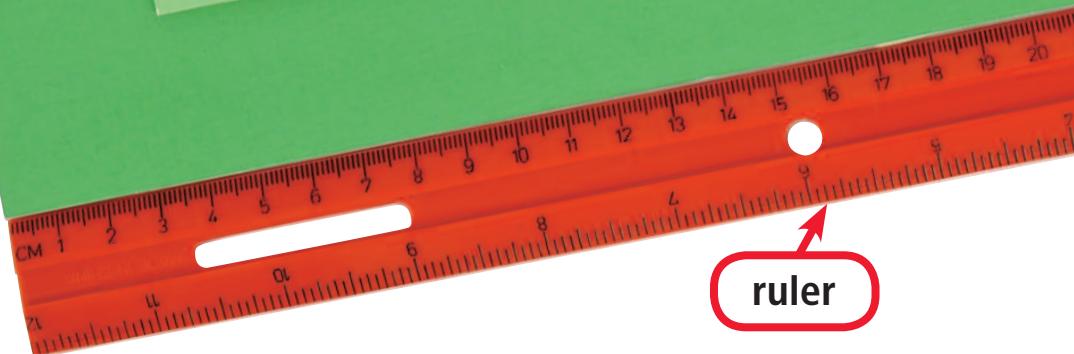


All solids have a shape of their own.  
You can do things to change the shape.  
You can bend a solid or break it or cut it.  
But the shape does not change on its own.

# Measuring Solids



You can measure the mass of a solid.  
A balance helps you measure mass.



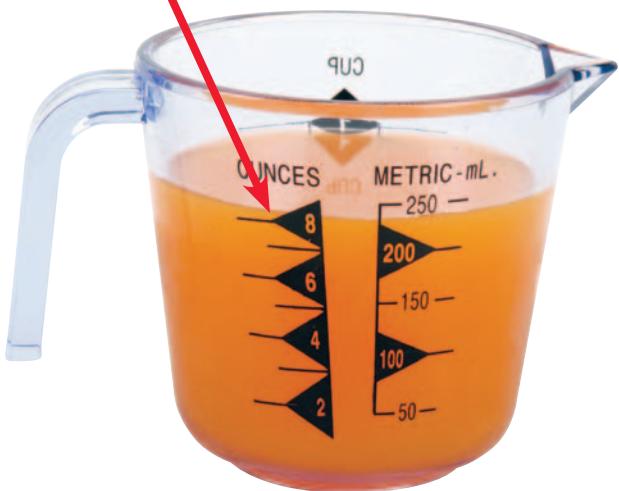
You can measure the size of a solid.  
A ruler helps you measure size.  
A ruler may measure in centimeters.  
Or, it may measure in inches.

# Liquids



A liquid is a form of matter.  
Liquids do not have their own shape.  
They take the shape of their container.

**measuring cup**



You can measure the volume of a liquid.  
A measuring cup measures volume.  
It may measure volume in milliliters.  
Or, it may measure volume in ounces.

# Air and Other Gases



A gas is a form of matter.  
A gas has no shape of its own.  
A gas fills its entire container.



Air is made up of gases.  
You can not see or smell air.  
But you can see what air does.

## **Vocabulary**

**centimeter**, p. 7

**gas**, p. 10

**liquid**, p. 8

**mass**, p. 2

**matter**, p. 2

**milliliter**, p. 9

**property**, p. 3

**solid**, p. 4

**texture**, p. 4

**volume**, p. 9

## **Think About the Reading**

- 1.** What questions do you have after reading this book?
- 2.** How can you find the answers to these questions?

## **Hands-On Activity**

- 1.** Put five balloons in a paper bag.
- 2.** Blow up the balloons with air. Put them back in the bag. What do you observe? What property of matter does this show?

## **School-Home Connection**

Tell a family member what you have read about changes in matter. Talk with the family member about the ways matter changes when food is prepared.