

# Recycling is as Easy as 1, 2, 3...

from **Celebrating Chemistry**



Chemists Celebrate Earth Day

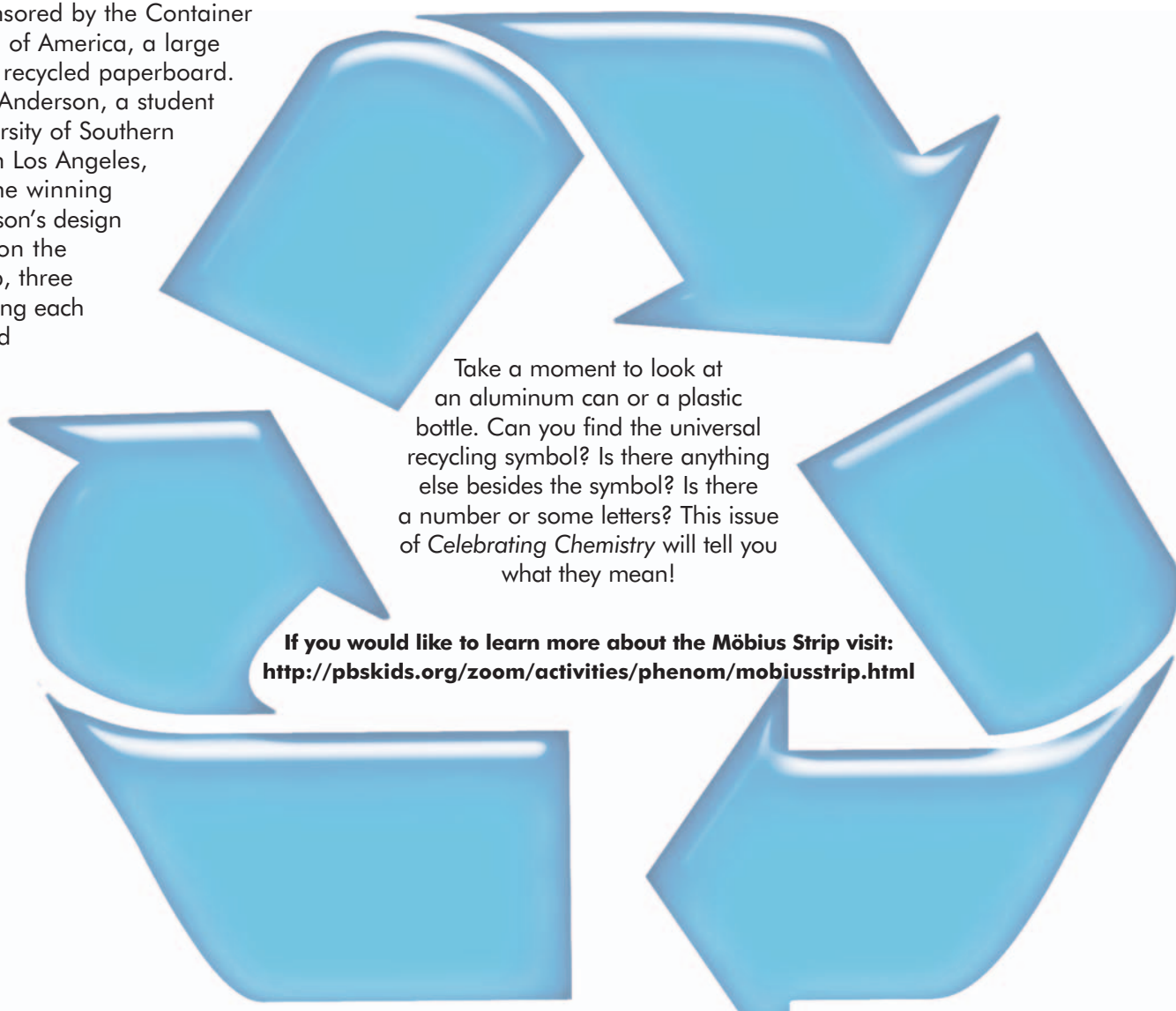
**T**he universal recycling symbol is used worldwide to mark both items that you can recycle and those that someone has recycled already. And as the endless cycle of arrows shows, chances are you can recycle the recycled products again too!

The symbol was created in 1970 through a nationwide design contest sponsored by the Container Corporation of America, a large producer of recycled paperboard. Gary Dean Anderson, a student at the University of Southern California in Los Angeles, submitted the winning entry. Anderson's design was based on the Möbius Strip, three arrows chasing each other around a triangle.

A Möbius strip is an unending loop developed by the 19th-century German mathematician August Ferdinand Möbius. He discovered that a strip of paper twisted once over and joined at the tips formed a continuous, single edged, one-sided surface. Anderson wanted to design a symbol that showed materials can be used over and over again.

Over time, each segment has come to stand for one of the steps in recycling:

1. Collecting recyclable materials,
2. Manufacturing recycled goods, and
3. Buying recycled products.



Take a moment to look at an aluminum can or a plastic bottle. Can you find the universal recycling symbol? Is there anything else besides the symbol? Is there a number or some letters? This issue of *Celebrating Chemistry* will tell you what they mean!

**If you would like to learn more about the Möbius Strip visit:**  
<http://pbskids.org/zoom/activities/phenom/mobiusstrip.html>



American Chemical Society  
Office of Community Activities  
1155 16th Street, NW, Washington, DC 20036  
email [kids@acs.org](mailto:kids@acs.org) or call 800-227-5558, x 6097  
[chemistry.org/kids](http://chemistry.org/kids)  
Originally published 2007.

© 2007