

Element Advertisement

Lesson Concept Elements on the Periodic Table, combined in various ways, make up all the matter in the universe. Metals have properties, such as, luster, thermal and electrical conductivity, and ductility. Non-metals are brittle, have little to no metallic luster, and are poor conductors of heat and electricity.

Link Culminating activity to illustrate what students have learned about matter.

Time 2 hours and 35 minutes

Materials

Whole class
Sample Element Advertisement
Enlarged Periodic Table

Per Group (groups of 2)
1 small Ziploc™ bag with cereal and water or milk
1 magnet
Empty cereal box from previous lesson

Individual
Element Advertisement Direction sheet
Periodic Table
8 ½ x 11 white paper
Markers or colored pencils
Glue
Scissors
Science Notebook

Advance

Preparation

1. Combine cereal with milk or water in Ziploc™ bags to achieve soggy cereal.
2. Prepare sample Element Advertisement
3. Reproduce element Advertisement Direction Sheet and Periodic Table

Procedure:

Engage *(15 minutes) Elements on the Periodic Table, combined in various ways, make up all the matter in the universe.*

1. Distribute bags of soggy cereal, and magnets to pairs of students. Have students observe the soggy cereal in the bag. Share observations.
2. Have students run magnets over the cereal bag.
3. Discuss student observations. Ask students what they extracted? Keep probing until students understand that the material attached to the magnets is the element iron.
4. Distribute cereal boxes to students and have them look for metals listed in the ingredient list.
5. Distribute Periodic Tables and have students find metals from the ingredient list.

Explore *(1 hour) Elements on the Periodic Table, combined in various ways, make up all the matter in the universe.*

6. Tell students that they will be assigned an element for a project.
7. Display example element advertisement. Discuss contents of the advertisement.
8. Tell students that they will create an advertisement for their element. All the advertisements will be glued together to make a class Periodic Table.
9. Distribute Element Advertisement Directions. Discuss project directions and refer students to example poster.
10. Give students time to create advertisements.

Explain *(1 hour) Elements on the Periodic Table, combined in various ways, make up all the matter in the universe.*

11. Students present element advertisements. As students present projects, arrange the advertisements on the whiteboard in a periodic table format.

Extend *(10-15 minutes) Elements on the Periodic Table, combined in various ways, make up all the matter in the universe.*

12. Have students look at the Advertisement Periodic Table on the whiteboard. Then, have students pair-share about what they observe about the arrangement of the elements.

Evaluate *(10 minutes) Elements on the Periodic Table, combined in various ways, make up all the matter in the universe.*

13. Have students respond to the following prompts in their science notebook: Where are elements found? List 5 different examples. What elements do you use every day? What did you observe about the arrangement of the elements on the Periodic Table?