

MAGIC COLOR

Donna D. Wisniewski, 1st-grade teacher
Sharonville Elementary
Cincinnati, OH

Lesson Summary for Grades K–2

Students experiment with Crayola® Color Wonder™ markers and paper. They discover that the Color Wonder markers only work with Color Wonder paper, not with regular paper. They learn that the Color Wonder markers work because of a chemical reaction between the markers and the paper. Students also do an art activity and read various stories about colors.

Science Activity

Students learn that a chemical reaction is responsible for the effects seen with Crayola Color Wonder markers.

Key Science Topics:

- chemical reaction

Key Process Skills:

- observing
- predicting
- comparing/contrasting

Ohio Proficiency Learning Outcomes for Science:

Fourth Grade

- I-4 Use a simple key to distinguish between objects.
- I-6 Evaluate a simple procedure to carry out an exploration.
- I-8 Evaluate observations and measurements made by other persons.

Time Required

Setup 15 minutes

Performance 30 minutes

Cleanup 15 minutes

Materials

For the Procedure

- 4 packages Crayola Color Wonder markers
- 24 sheets of Crayola Color Wonder paper
- 24 sheets of white copy paper
- 24 sheets of white construction paper

Safety and Disposal

There are no safety concerns for this experiment. All items can safely be disposed of in a waste can or sink.

Student Background

Students should have some experience with color, markers, and different kinds of paper. Students should also have prior experience with mixing colors.

Getting Ready

Cut all paper to the same size.

Procedure

1. Tell students they will receive one marker and three sheets of paper. Ask students not to touch any of the materials until all directions are given.
2. Lay each paper flat on the desk side by side. The order does not matter.
3. Tell students they will be writing their names on each of the papers. Then ask them what they think will happen.
4. Have them write on each paper. Ask them what they see.
5. Ask if anyone thinks they know why it happened.
6. Give the students an explanation they can understand.

Explanation

The color changes observed are a result of a chemical reaction between chemicals in the Color Wonder paper and chemicals in the Color Wonder markers. Both types of chemicals are required for the reaction to occur. Using the marker on paper other than the Color Wonder paper produces no reaction. Once the reaction occurs it is permanent.

Art Activity

Students do an art activity using the Color Wonder markers and paper.

Students work in groups and use a variety of colored markers. They color their fingertips with a marker of choice and then place their prints on the Color Wonder paper. Students then turn their fingerprints into leaves falling from a tree for a fall picture.

Language Arts Activity

Students read various books about color and create their own books.

Have students read books such as *You'd Never Believe It But...a Rainbow is a Circle and Other Facts About Color* by Helen Taylor; *Colors* by Ruth Heller; *All About Colors* by Steven Traugh; *Colors* by Gallimard Jeunesse; *Lionel in the Fall* by Stephen Krensky; and *Samuel Todd's Book of Great Colors* by E.L. Konigsburg.

Students make read-aloud books with the titles: *Autumn Leaves Are Falling Down* and *A Rainbow of Colors*.

References

Fleming, M. *25 Holiday and Seasonal Emergent Reader Mini-Books*; Scholastic Professional: New York, 1997. (ISBN: 0-590-33071-3)

Robillard, V. *15 Reproducible Write-and-Read Books: Instant Patterns for Easy Predictable Books Your Students Help Write!*; Scholastic Professional: New York, 1997. (ISBN: 0-590-49890-8)