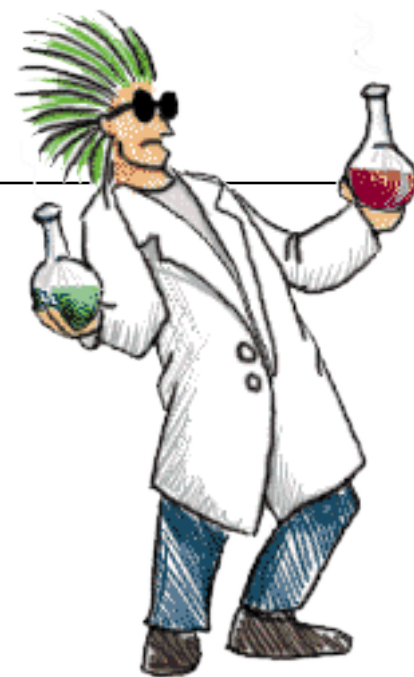


Physical and Chemical Changes

A Write On Activity



Objective: Chemical/Physical Change: Differentiate





Essential Questions

How can matter be changed?

How can I tell if matter has undergone a physical or chemical change?



Matter

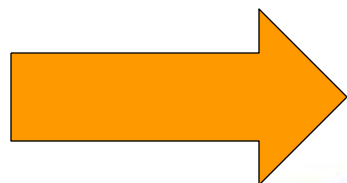
- ❑ Matter is everywhere.
- ❑ Matter is anything that takes up space and has mass.
- ❑ Matter is constantly experiencing both chemical and physical changes.



Physical Change

- **Physical changes** occur when matter changes its property but not its chemical nature.
- Physical property changes could include a change in: texture, shape, size, color, odor, volume, mass, weight, and density.

Physical Change





Chemical Change

- ❑ **Chemical changes** are changes matter undergoes when it becomes new or different matter.
- ❑ To identify a chemical change look for signs such as color change, bubbling and fizzing, light production, smoke, and presence of heat.

Chemical Change

- A chemical change occurs when fireworks are used. Fireworks are made of metals such as magnesium and copper. These change chemically as they light up the sky.



Is it a chemical or physical change?

Sugar dissolving in tea

• Chemical Change

• Physical Change



NO!



OOPS!

Did it change size, color, shape (Physical Change)?

or

Did it become different matter (Chemical Change)?



Correct!

YES!



Is it a chemical or physical change?

Logs burning

• Chemical Change

• Physical Change



NO!



OOPS!

Did it change size, color, shape (Physical Change)?

or

Did it become different matter (Chemical Change)?



Correct!

YES!



Is it a chemical or physical change?

Breaking water up by separating it into hydrogen and oxygen



- Chemical Change
- Physical Change

NO!



OOPS!

Did it change size, color, shape (Physical Change)?

or

Did it become different matter (Chemical Change)?



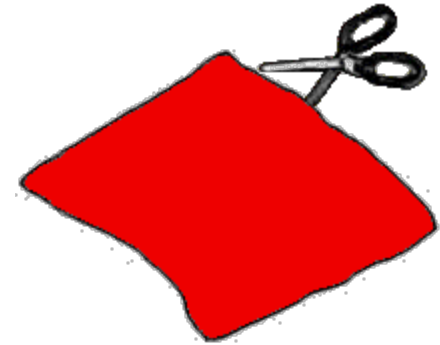
Correct!

YES!



Is it a chemical or physical change?

Cutting paper



- Chemical Change
- Physical Change

NO!



OOPS!

Did it change size, color, shape (Physical Change)?

or

Did it become different matter (Chemical Change)?



Correct!

YES!



Is it a chemical or physical change?

Crushing an aspirin

• Chemical Change

• Physical Change



NO!



OOPS!

Did it change size, color, shape (Physical Change)?

or

Did it become different matter (Chemical Change)?



Correct!

YES!



Is it a chemical or physical change?

Metal rusting

- Chemical Change

- Physical Change



NO!

OOPS!



Did it change size, color, shape (Physical Change)?

or

Did it become different matter (Chemical Change)?



Correct!

YES!



Is it a chemical or physical change?

Lighter fluid
burning



- Chemical Change
- Physical Change

NO!



OOPS!

Did it change size, color, shape (Physical Change)?

or

Did it become different matter (Chemical Change)?



Correct!

YES!



Is it a chemical or physical change?

An egg rotting

- Chemical Change

- Physical Change

Smells Like...



Rotten Eggs

NO!



OOPS!

Did it change size, color, shape (Physical Change)?

or

Did it become different matter (Chemical Change)?



Correct!

YES!



Is it a chemical or physical change?

An egg breaking



- Chemical Change

- Physical Change

NO!



OOPS!

Did it change size, color, shape (Physical Change)?

or

Did it become different matter (Chemical Change)?



Correct!

YES!



Writing Activity

- Write a paragraph about the difference between a chemical and physical change. Give examples of each.

