



Chemical and Physical Changes

Name: _____

Date: _____

Grade: Grade 5

Part A: Fix the Sentence

Each sentence has an error. Rewrite it correctly on the line.

1. Fix the sentence: Fireworks exploding in the sky are a physical change.

Rewrite: _____

2. Fix the sentence: Mixing vinegar and baking soda fizz because of a physical change.

Rewrite: _____

3. Fix the sentence: Plants doing photosynthesis is just moving sunlight around physically.

Rewrite: _____

Part B: Fill in the Blank

Write the missing word or number on each line.

1. When food is digested in your stomach, it goes through a _____ change that creates new substances.
2. The fizzing bubbles when vinegar meets baking soda are made of _____ dioxide gas.
3. Plants use sunlight to combine water and carbon dioxide into _____, a sugar that fuels their growth.
4. The _____ of a firework releases gases, light, heat, and sound all at once.

Part C: Short Answer

Answer each question in one or two complete sentences.

1. Why is rust forming on an old bicycle a chemical change instead of a physical change?

2. Explain why baking a cake is a chemical change, even though it starts with simple ingredients.

Answer Key · Chemical and Physical Changes · Grade: Grade 5

Part A: Fix the Sentence

Each sentence has an error. Rewrite it correctly on the line.

1. Fix the sentence: Fireworks exploding in the sky are a physical change.

Rewrite: **Fireworks exploding in the sky are a chemical change.**

2. Fix the sentence: Mixing vinegar and baking soda fizz because of a physical change.

Rewrite: **Mixing vinegar and baking soda fizzes because of a chemical change.**

3. Fix the sentence: Plants doing photosynthesis is just moving sunlight around physically.

Rewrite: **Plants doing photosynthesis make new sugar through a chemical change.**

Part B: Fill in the Blank

Write the missing word or number on each line.

- When food is digested in your stomach, it goes through a **chemical** change that creates new substances.
- The fizzing bubbles when vinegar meets baking soda are made of **carbon** dioxide gas.
- Plants use sunlight to combine water and carbon dioxide into **glucose**, a sugar that fuels their growth.
- The **combustion** of a firework releases gases, light, heat, and sound all at once.

Part C: Short Answer

Answer each question in one or two complete sentences.

1. Why is rust forming on an old bicycle a chemical change instead of a physical change?

Rust is a chemical change because iron in the bicycle reacts with oxygen and water in the air to form a new substance called iron oxide. Rust has a different color, texture, and properties from the original iron, and you cannot easily turn it back into shiny metal again.

2. Explain why baking a cake is a chemical change, even though it starts with simple ingredients.

Baking a cake is a chemical change because heat causes the flour, eggs, sugar, and baking soda to react and form new substances. The fluffy cake has different taste, texture, and smell from the runny
