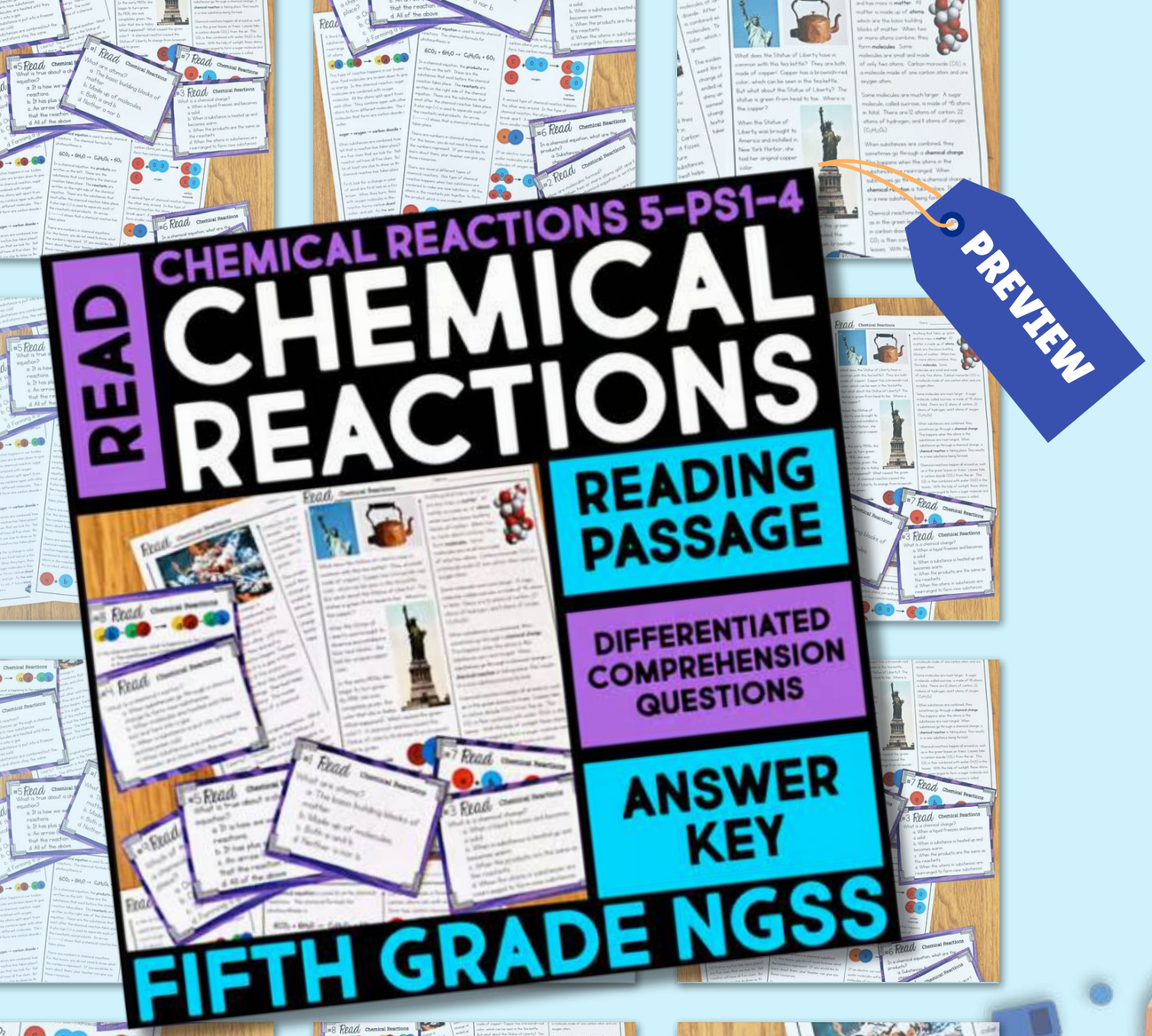


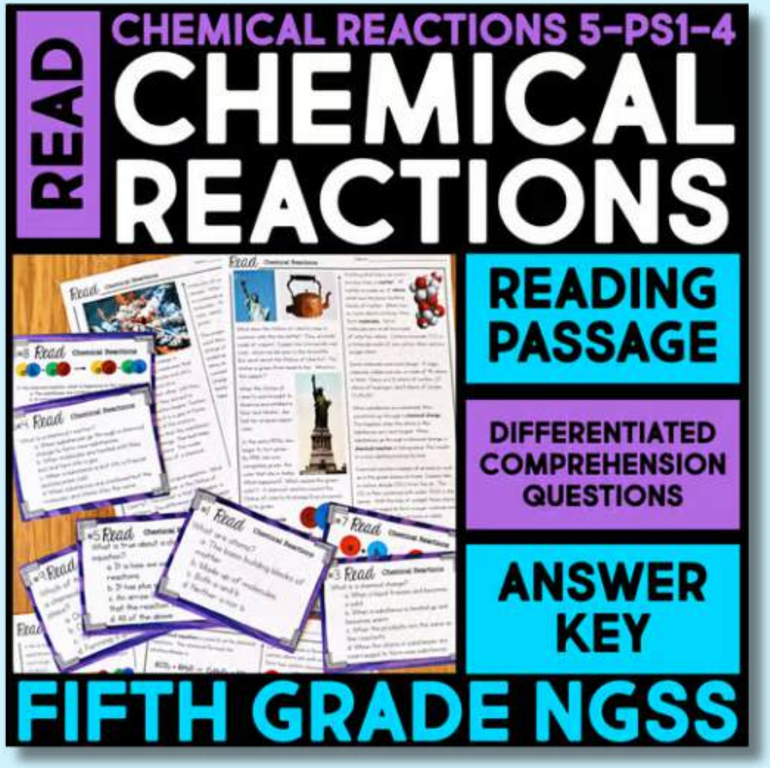
5TH GRADE

Science Reading That Builds Real Understanding

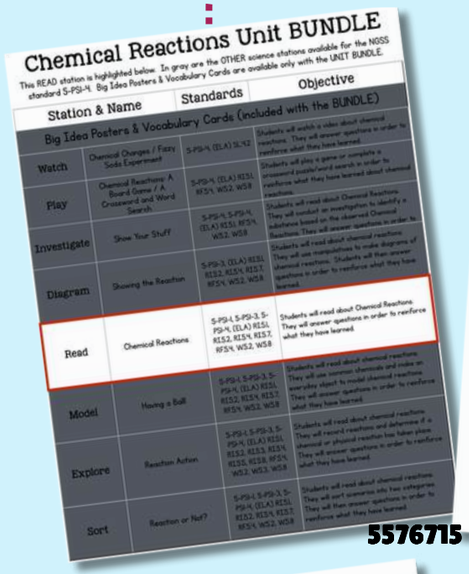
READ ABOUT CHEMICAL REACTIONS

KEEP SCROLLING TO SEE WHAT'S INSIDE!

ACTIVITY OVERVIEW



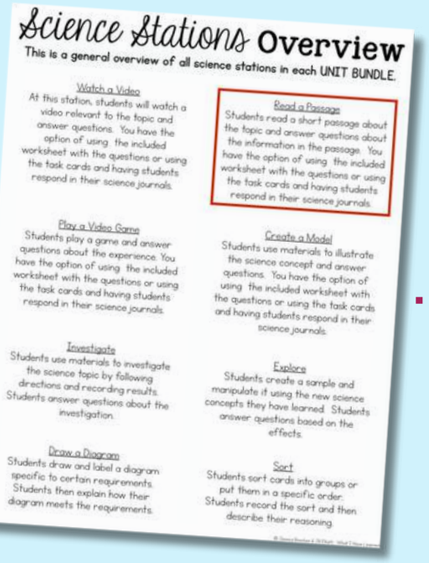
ADD TO CART


Chemical Reactions Unit BUNDLE

This READ station is highlighted below. In gray are the OTHER science stations available for the NGSS standard 5-PS1-4. Big Idea Posters & Vocabulary Cards are available only with the UNIT BUNDLE.

Station & Name		Standards	Objective
Big Idea Posters & Vocabulary Cards (included with the BUNDLE)			
Watch	Chemical Changes / Fizzy Soda Experiment	5-PS1-4, (ELA) SL.5.2	Students will watch a video about chemical reactions. They will answer questions in order to reinforce what they have learned.
Play	Chemical Reactions: A Board Game / A Crossword and Word Search	5-PS1-4, (ELA) RI.5.1, RF.5.4, WS.2, WS.8	Students will play a game or complete a crossword puzzle/word search in order to reinforce what they have learned about chemical reactions.
Investigate	Show Your Stuff	5-PS1-4, 5-PS1-4, (ELA) RI.5.1, RF.5.4, WS.2, WS.8	Students will read about Chemical Reactions. They will conduct an investigation to identify a substance based on the observed Chemical Reactions. They will answer questions in order to reinforce what they have learned.
Diagram	Showing the Reaction	5-PS1-3, (ELA) RI.5.1, RI.5.2, RI.5.4, RI.5.7, RF.5.4, WS.2, WS.8	Students will read about chemical reactions. They will use manipulatives to make diagrams of chemical reactions. Students will then answer questions in order to reinforce what they have learned.
Read	Chemical Reactions	5-PS1-4, 5-PS1-3, 5-PS1-4, (ELA) RI.5.1, RI.5.2, RI.5.4, RI.5.7, RF.5.4, WS.2, WS.8	Students will read about Chemical Reactions. They will answer questions in order to reinforce what they have learned.
Model	Having a Ball	5-PS1-1, 5-PS1-3, 5-PS1-4, (ELA) RI.5.1, RI.5.2, RI.5.4, RI.5.7, RF.5.4, WS.2, WS.8	Students will read about chemical reactions. They will use common chemicals and make an everyday object to model chemical reactions. They will answer questions in order to reinforce what they have learned.
Explore	Reaction Action	5-PS1-1, 5-PS1-3, 5-PS1-4, (ELA) RI.5.1, RI.5.2, RI.5.3, RI.5.4, RI.5.5, RI.5.8, RF.5.4, WS.2, WS.3, WS.8	Students will read about chemical reactions. They will record reactions and determine if a chemical or physical reaction has taken place. They will answer questions in order to reinforce what they have learned.
Sort	Reaction or Not?	5-PS1-1, 5-PS1-3, 5-PS1-4, (ELA) RI.5.1, RI.5.2, RI.5.4, RI.5.7, RF.5.4, WS.2, WS.8	Students will read about chemical reactions. They will sort scenarios into two categories. They will then answer questions in order to reinforce what they have learned.

5576715


Science Stations Overview

This is a general overview of all science stations in each UNIT BUNDLE.

Watch a Video
At this station, students will watch a video relevant to the topic and answer questions. You have the option of using the included worksheet with the questions or using the task cards and having students respond in their science journals.

Read a Passage
Students read a short passage about the topic and answer questions about the information in the passage. You have the option of using the included worksheet with the questions or using the task cards and having students respond in their science journals.

Play a Video Game
Students play a game and answer questions about the experience. You have the option of using the included worksheet with the questions or using the task cards and having students respond in their science journals.

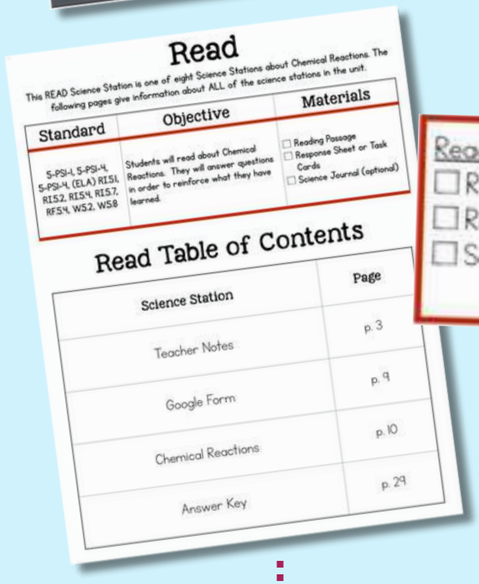
Create a Model
Students use materials to illustrate the science concept and answer questions. You have the option of using the included worksheet with the questions or using the task cards and having students respond in their science journals.

Investigate
Students use materials to investigate the science topic by following directions and recording results. Students answer questions about the investigation.

Explore
Students create a sample and manipulate it using the new science concepts they have learned. Students answer questions based on the effects.

Draw a Diagram
Students draw and label a diagram specific to certain requirements. Students then explain how their diagram meets the requirements.

Sort
Students sort cards into groups or put them in a specific order. Students record the sort and then describe their reasoning.


Read

This READ Science Station is one of eight Science Stations about Chemical Reactions. The following pages give information about ALL of the science stations in the unit.

Standard	Objective	Materials
5-PS1-1, 5-PS1-4, 5-PS1-4, (ELA) RI.5.1, RI.5.2, RI.5.4, RI.5.7, RF.5.4, WS.2, WS.8	Students will read about Chemical Reactions. They will answer questions in order to reinforce what they have learned.	☐ Reading Passage ☐ Response Sheet or Task Cards ☐ Science Journal (optional)

Read Table of Contents

Science Station	Page
Teacher Notes	p. 3
Google Form	p. 9
Chemical Reactions	p. 10
Answer Key	p. 29

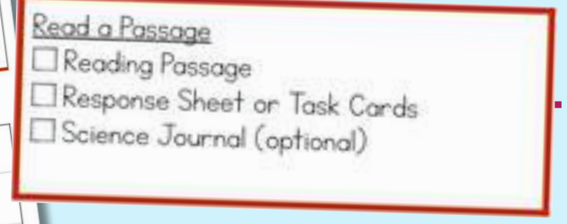

Read a Passage
☐ Reading Passage
☐ Response Sheet or Task Cards
☐ Science Journal (optional)

Table of Contents

Science Station Overview

Materials Checklist

Table of Contents / Teacher's Notes

WHAT'S INCLUDED

READ SCIENCE STATION

- Teacher Notes
- **Student Text** in two formats
- Student **Instructions**
- **Activity Sheets** for observation
- Differentiated **Questions**
- Answer Key
- Google Form

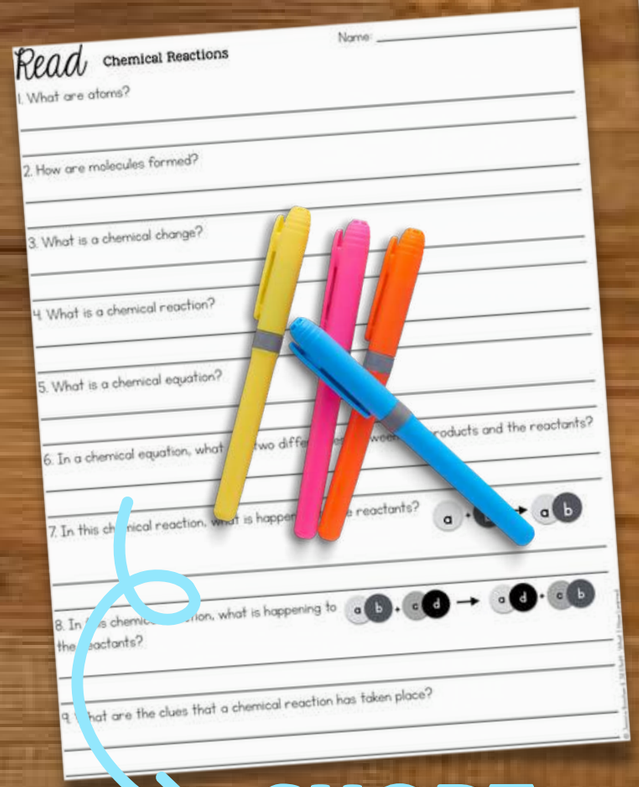


READING PASSAGE

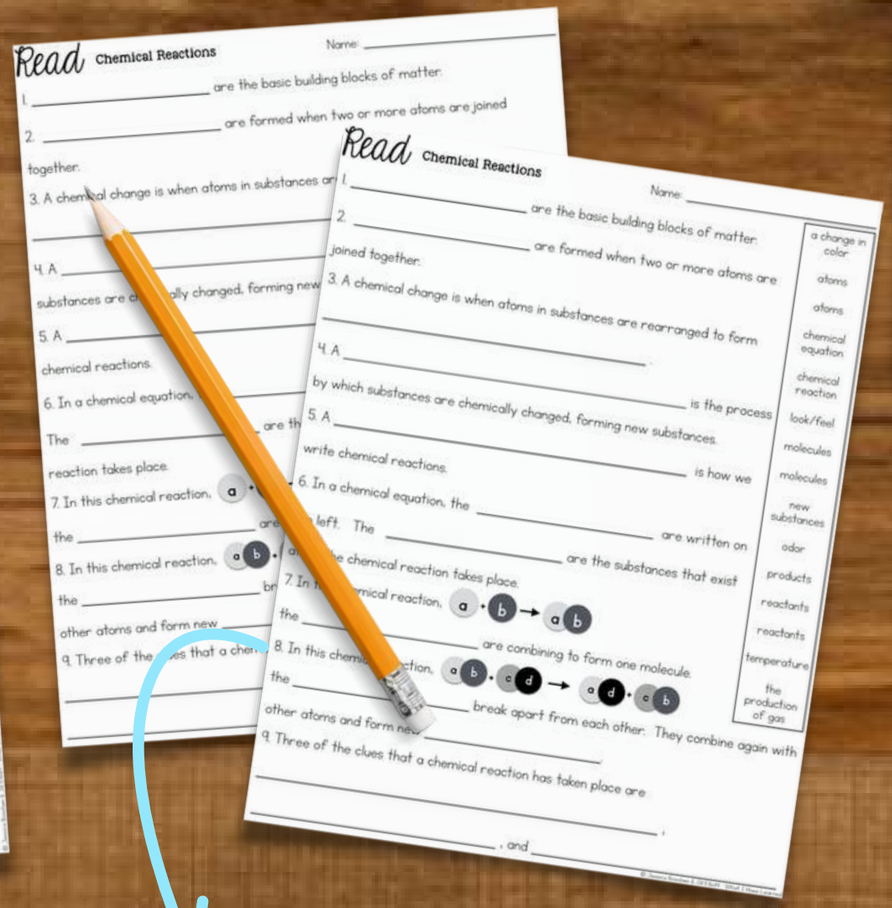


AVAILABLE IN TWO FORMATS

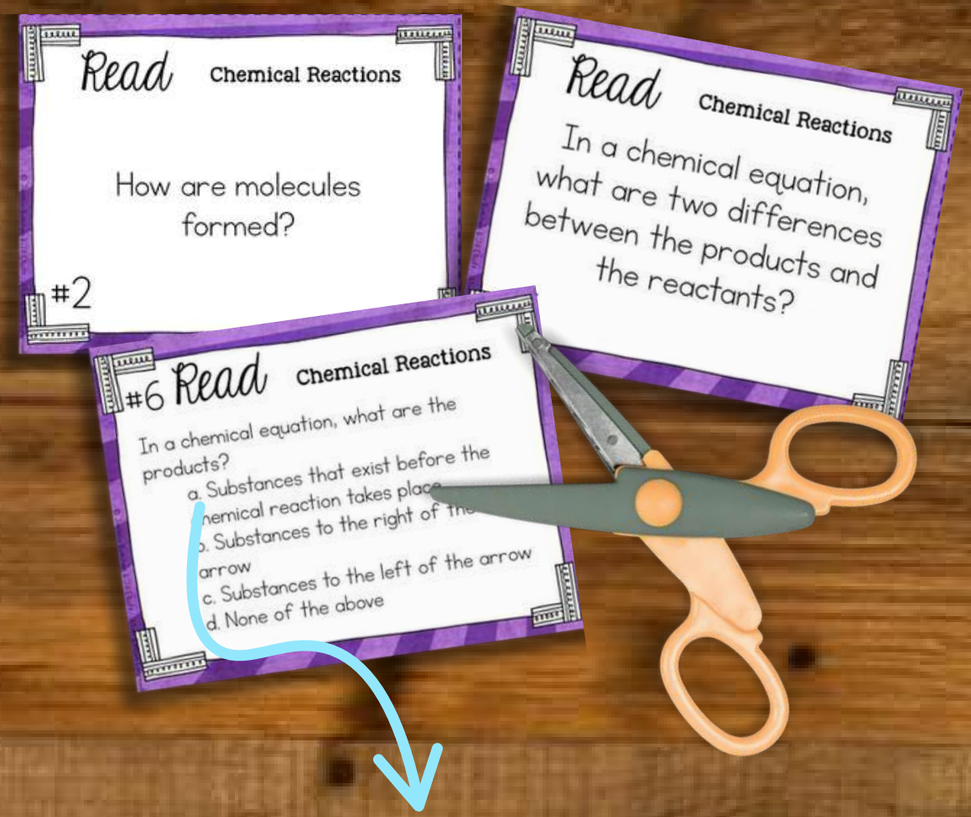
DIFFERENTIATED QUESTIONS



SHORT ANSWER



FILL-IN-THE BLANK



TASK CARDS: SHORT ANSWER & MULTIPLE CHOICE

Read — Chemical Reactions



What does the Statue of Liberty have in common with this tea kettle? They are both made of copper! Copper has a brownish-red color, which can be seen in the tea kettle. But what about Statue of Liberty? The statue is green from head to toe. Where is the copper?

Read — Chemical Reactions

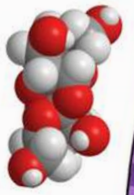
Anything that takes up space and has mass is **matter**. All matter is made up of **atoms**, which are the basic building blocks of matter. When two or more atoms combine, they form **molecules**. Some molecules are small and made of only two atoms. Carbon monoxide (CO) is a molecule made of one carbon atom and one oxygen atom.

carbon monoxide molecule

C O

carbon oxygen

Some molecules are much larger. A sugar molecule, called sucrose, is made of 45 atoms in total. There are 12 atoms of carbon, 22 atoms of hydrogen, and 11 atoms of oxygen ($C_6H_{22}O_6$).



combined, they sometimes go through
is happens when the atoms in the
ged. When substances go through a
cal reaction is taking place. This
being formed.

around us, such as in the green leaves on trees.
(CO_2) from the air. This CO_2 is then combined with
the help of sunlight, these atoms are rearranged
gen gas (O_2). This process is called

chemical reactions. The chemical formula for

$C_6H_{12}O_6 + 6O_2$

p. 2

Read — Chemical Reactions

In a chemical equation, the **reactants** are written on the left. These are the substances that exist before the chemical reaction takes place. The **products** are written on the right side of the chemical equation. These are the substances that exist after the chemical reaction takes place. A plus sign (+) is used to separate each of the reactants and products. An arrow (------>) shows that a chemical reaction has taken place.

There are numbers in chemical equations. For this lesson, you do not need to know what the numbers represent. If you would like to learn about them, your teacher can give you those resources.

There are several different types of chemical reactions. One type of chemical reaction happens when two substances are combined to make one new substance. All the atoms in the reactants join together to form the product, which is one molecule.

a + b → a b

this way. Two carbon atoms join with an oxygen
molecules.

C O + O → C O C O

carbon oxygen carbon monoxide

p. 3

Read — Chemical Reactions

Name: _____

1. What are atoms?
Atoms are the basic building blocks of matter.

2. How are molecules formed?
Molecules are formed when two or more atoms are joined together.

3. What is a chemical change?
A chemical change is when atoms in substances are rearranged to form new substances.

4. What is a chemical reaction?
A chemical reaction is the
ces are chemically changed, forming
new substances.

5. What is a chemical equati
A chemical equation is how

6. In a chemical equation, what are
e products and the reactants?
Choose 1 for first answer: In a chemical equation, the
They are the substances that exist before the
chemical reaction takes place. Choose 1 for the second an
n the right side. They are the substances
t exist after the chemical reaction takes place.

7. In this chemical reaction, what is happening
a + b → a b
In this chemical reaction, the reactants are comb
molecule.

8. In this chemical reaction, what is happening to
the reactants?
a d + c b
In this chemical reaction, the atoms break apart.
with other atoms
and form new molecules.

9. What are the clues that a chemical reaction has tak
The clues that a chemical reaction has taken place a
temperature, look/
feel, odor, and the production of a gas.

© Jamie Brooks & Kristi Wise Harrod

#8 Read — Chemical Reactions

a b + c d → a d + c b

In this chemical reaction, what is happening to the reactants?
a. The substances are combining to form one molecule.
b. A mixture is being formed, but there is no real chemical change.
c. The molecule is breaking apart to form separate atoms.
d. The atoms are breaking apart. They will combine again with different atoms.

Read — Chemical Reactions

In a chemical equation, what are two differences between the products and the reactants?

#6

Read — Chemical Reactions

In this chemical reaction, what is happening to the reactants?

a b + c d → a d + c b

#8

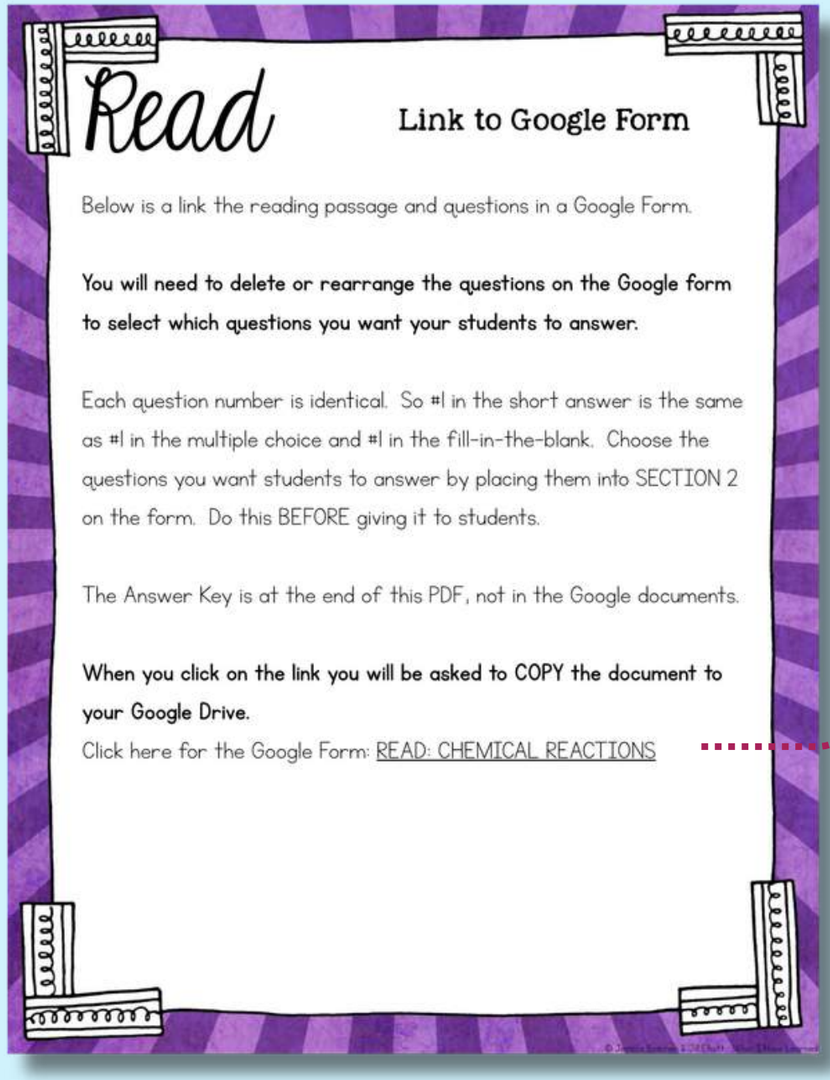


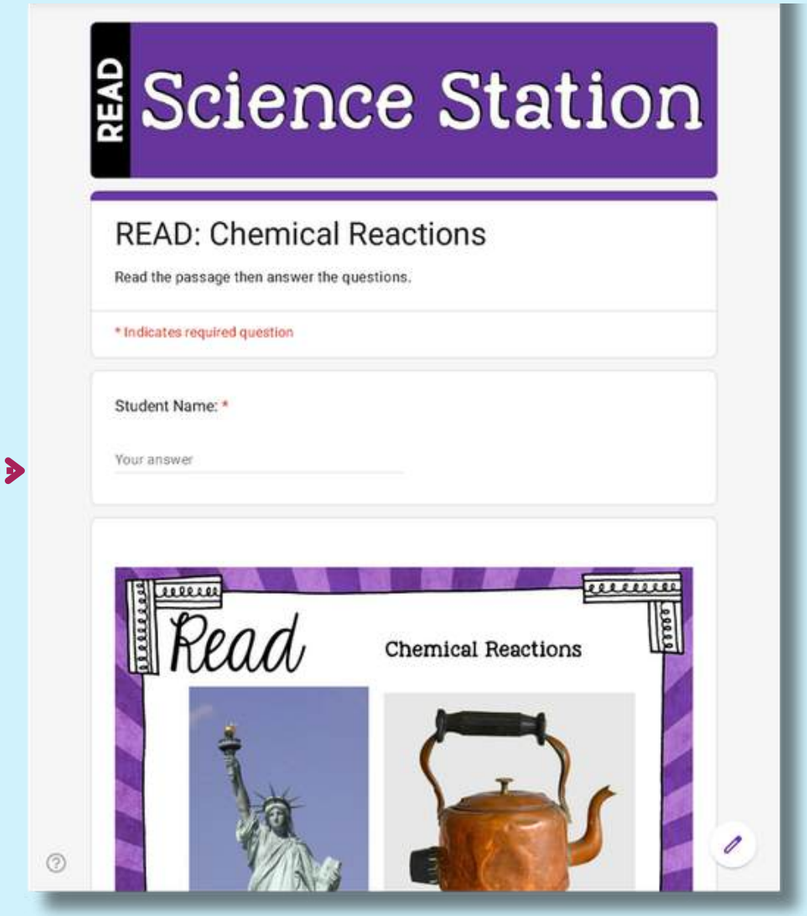
DIGITAL VERSIONS

DIGITAL VERSIONS

- ✔ Google Sheet with Activity & Directions
- ✔ Google Form with Reading & Questions

Answer keys provided





ADD TO CART

YOU WILL LOVE THIS BECAUSE



Builds Science and Reading Skills

Students strengthen comprehension while learning important science concepts through informational text and targeted questions.



Aligns with NGSS and Reading Standards

Meets 5th-grade expectations for life science and nonfiction comprehension with questions that promote evidence-based responses.



Easy Differentiation Without Extra Prep

Strengthens science comprehension skills while reinforcing key physics and chemistry vocabulary and core conservation of mass concepts.

TEACHERS LOVE IT!

This is a terrific resource. I love the interactive part and the lower elementary for my 5th graders.

Kerri kennamore



This science reading passage on chemical reactions was perfect for my 5th graders. The content was clear, well-organized, and aligned perfectly with the NGSS standards...

Itzel I.



CLICK HERE TO ADD THIS RESOURCE TO YOUR CART:

ADD TO CART

Check out securely
Download instantly

Leave a Review
to earn Reward Points
to get more resources!

My passion is making learning accessible to all students.
I love scaffolding learning, breaking down the concepts and building them up so that students can see the connections.
I love figuring out the small components that build up to the big ideas and helping students see it all.





What I have LEARNED